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# Examining the Factors Influencing Female African American Doctoral Students to Select Higher Education Leadership as a Career

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# EXAMINING THE FACTORS INFLUENCING FEMALE AFRICAN AMERICAN DOCTORAL STUDENTS TO SELECT HIGHER EDUCATION LEADERSHIP AS A CAREER

by

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## Dedication

This dissertation is dedicated to my mother, Henrietta Martin, my father, the late Oscar Martin, Jr., and my grandmother, the late Rosie Bell Williams. It was your love and support that helped me to complete this project. When I doubted that I could finish, you insisted that I could because I was called to do greater things. You encouraged me to strive toward the goal despite the obstacles. You challenged me and told me never to give up. Thank you for loving and believing in me.

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## Abstract

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The objective of this study was to identify reasons why African American women who are enrolled in higher education administration doctoral programs become senior higher education leaders, i.e., college presidents, chief academic officers, and vice-presidents. This study applied the Social Cognitive Career Theory (SCCT) to examine these reasons. The research population included female African American doctoral students enrolled in higher education administration programs from 12 institutions located in the southern United States. Using multistage sampling, a sample of 29 was established. Data were collected using the SCCT survey questionnaire which consisted of five parts: self-efficacy, outcome expectations, vocational interests, barriers, and supports. Reliability was assessed using Cronbach's Alpha. To analyze the data, statistical methods and SPSS software were used. Results indicated that self-efficacy is positively associated with vocational interests, supports-social, and human capital. In addition, outcome expectations-satisfaction is positively associated with vocational interests and supports-human capital. Further, outcome expectations-power is positively associated with supports-human and social capital. Additionally, vocational interests holds a negative association with barriers-discrimination and advancement and a positive association with supports-human capital. Practical implications and future research are discussed.

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# Chapter 1

## Introduction

What are the intentions of African American female doctoral students enrolled in higher education administration programs? What factors lead African American women to select higher education administration as a career choice? The aim of this study was to identify reasons why few African American women who are enrolled in higher education administration doctoral programs become senior higher education leaders, i.e., college presidents, chief academic officers, and vice-presidents.

### Background of Study

According to the *Chronicle 2012-2013 Almanac* (2012), the top fields of study among college and university presidents are education or higher education (37.7%) followed by humanities (14.2%) and social sciences (11.9%). The fields of study chosen by current college and university presidents provide those who aspire to become senior higher education leaders an academic path. Several research studies on African American doctoral students have focused on the doctoral educational experiences of African American women (Henry, 2010; Jackson & Harris, 2007; Waring, 2003; and Zamani, 2003). This research focused on experiences and perceptions of barriers, enrollment, student affairs, gender and race and graduate school persistence. Although these are important areas of study, there are few studies that have explored the specific goals and possible barriers faced by female African American doctoral students in higher education administration. Alfred (2001) examined "the developmental experiences that contributed to a successful career (measured by tenure and promotion) of five Black tenured female faculty at a predominantly White research university. More importantly,

the study explored the strategies the women used to successfully navigate the White-dominated academic culture" (p. 110). Alfred (2001) asserted that alienation, isolation, and social marginalization characterize the Black experience in predominantly White academic institutions, which are perceived as barriers to a successful career in the academy. Further, there is a void regarding the career self-efficacy and career outcome expectations of female African American doctoral students in this field. Henry (2010) conducted a study on African American women in student affairs and asserted that his "report is indicative of the lack of research that exists regarding women in student affairs in general and even more scant studies of African American women in postsecondary student affairs administration in particular" (p.2).

As for studies of self-efficacy, Cunningham, Bruening, Sartore, Sagas, and Fink, (2005) conducted a study of undergraduate college students' sport and leisure career choices and found that "self-efficacy and outcome expectations hold positive associations with vocational interests, which in turn are positively related to goals and that self-efficacy is also positively associated with outcomes expectations" (p. 122). As in Cunningham et al. study, self-efficacy may be a useful frame for examining the career choices of female African American doctoral students.

While research on women leaders in higher education is substantial, there is limited research with respect to African American women. The research on African Americans in higher education is primarily directed toward improving the retention of students and faculty, with little emphasis given to professionals in senior-level administrative positions (Jackson & Harris, 2007). Jackson and Harris (2007) stated that "the lack of studies available regarding African American females in higher education

leadership positions makes it difficult to obtain a clear picture outlining experiences and perceptions of barriers and supports that these leaders have experienced" (p. 119). This study examined female African American doctoral students' perceptions of barriers and support in the early stages of their career. Hacket and Byars (1996) stated that "no comprehensive model of the career development of racial and ethnic minorities has yet been developed; even less attention has been devoted to model of the career development of racial and ethnic minority women" (p. 322). This study contributes to the career development of African American women who aspire to become higher education leaders.

**Statement of the Problem**

The underrepresentation of female African American senior university leaders makes it difficult for aspiring leaders to find appropriate African American role models who have been successful in higher education leadership. Holmes (2004) stated that the underrepresentation of African American administrators in higher education is probably most exemplified in the office of the president. Henry (2010) asserted that "African American women in higher education contend with a common set of multiple marginalization due to their membership in at least two groups: African American and female" (p. 2). Reasons for that underrepresentation may involve the gender and race of the candidates, the recruitment and retention rates of underrepresented personnel, and university support systems or lack thereof. Marina and Robinson (2011) asserted:

> There is little debate that the number of women administrators has increased over the past twenty years; however, African American women have not made steady advancements in higher education. There is a gross underrepresentation of women

> of color, particularly African American women, holding senior administrative positions in higher education. (p. 1)

According to a study by Holmes (2004), there are a number of factors that contribute to the underrepresentation of African American presidents in higher education:

> (1) an insufficient applicant pool acerbated by the small number of doctorate degree recipients in the educational pipeline; (2) the academic leadership pipeline could be greatly increased if more African Americans in historically Black colleges and universities were viewed as viable candidates; African Americans from historically Black schools are not really considered to be in the same presidential leadership pool as Whites and the few minorities whose careers have been based at predominantly White schools were viewed as viable candidates; and (3) presidents in this study who attribute the underrepresentation of African Americans in traditionally White institution in particular to pure race discrimination. (p. 28)

This problem will likely continue if female African American doctoral students in higher education administration programs do not pursue higher education leadership roles or are experiencing barriers and/or lack of support in obtaining leadership roles.

**Purpose Statement**

This study has three purposes: (1) to determine the career self-efficacy and outcome expectations of female African American doctoral students enrolled in higher education administration programs at select 4-year public universities; (2) to examine the relationship between the career self-efficacy of African American female doctoral students enrolled in higher education administration programs and their decision to select

higher education leadership as a career goal; and (3) to examine the relationship between outcome expectations of the higher education leadership profession held by female African American doctoral students enrolled in higher education administration programs and their decision to select higher education leadership as a career choice. In this study, self-efficacy and outcome expectations represented the independent variables and vocational interests, barriers and supports represented the dependent variables.

For purposes of this study, a sample of the study population was female African American doctoral students enrolled in higher education administration programs at select public, 4-year universities located in the southern United States. Also, for purposes of this study, the southern United States included Alabama, Arkansas, Florida, Georgia, Mississippi, North Carolina, South Carolina, Tennessee, and Texas.

**Significance of the Problem**

One of the aims of this study was to identify the factors influencing female African American doctoral students to select higher education leadership as a career choice. This work may result in encouraging female African American doctoral students to pursue higher education leadership careers and thereby increase the number of female African American higher education leaders. This study is also expected to aid in promoting research and policy on the career development of African American women who desire to become higher education leaders.

**Research Questions**

The major research questions guiding this study are:

1. What is the career self-efficacy of female African American doctoral students enrolled in higher education administration programs at select 4-year public universities?
2. What outcome expectations do female African American enrolled in higher education administration programs have as a result of selecting higher education leadership as a career choice?
3. What is the relationship between the career self-efficacy of female African American doctoral students enrolled in higher education administration programs and their decision to select higher education leadership as a career choice?
4. What is the relationship between outcome expectations of the higher education leadership profession held by female African American doctoral students enrolled in higher education administration programs and their decision to select higher education leadership as a career choice?

**Definition of Terms**

For purposes of this study, federal standards on collecting and presenting data on race established by the Office of Management and Budget (OMB) were used to define racial ethnicity. The OMB defines Black or African American as people having origins in any of the Black racial groups of Africa (Office of Management and Budget, 2003). This study sought a population of those who identify themselves as Black or African American on this study's survey questionnaire. The terms African American and Black were used as synonymous terms throughout this document. Also, for purposes of this study, Bandura (1977) defined self-efficacy as "the expectation that coping behavior will

be initiated, how much effort will be expended, and how long it will be sustained in the face of obstacles and aversive experiences" (p. 191). Bandura (1986) refined his definition of self-efficacy as "people's judgments of their capabilities to organize and execute courses of action required to attain designated types of performances" (p. 391).

The Bureau of Labor Statistics (BLS) defines higher education administrators as "leaders who plan, direct, or coordinate research, instructional, student administration and services, and other educational activities at postsecondary institutions, including universities, colleges, and junior and community colleges" (p. 1)

The Integrated Postsecondary Education Data System (IPEDS, 2012) defines doctoral higher education or higher education administration academic programs as:

> A program that focuses on the principles and practice of administration in four-year colleges, universities and higher education systems, the study of higher education as an object of applied research, and which may prepare individuals to function as administrators in such settings. College coursework includes instruction in higher education economics and finance; policy and planning studies; curriculum; faculty and labor relations; higher education law; college student services; research on higher education; institutional research; marketing and promotion; and issues of evaluation, accountability and philosophy. (p. 1)

The following sections address a review of the literature in Chapter 2; the research design and methodology in Chapter 3; a report of the results in Chapter 4 and a discussion of the results in Chapter 5.

# Chapter 2

## Review of Literature

This review of the literature provides an overview of women's progression into higher education, and an overview of the history and career development of African American women in higher education and social cognitive career theory and its subsets. An absence in the literature exists regarding the factors influencing female African American doctoral students to select higher education leadership as a career choice. This study is an opportunity to add to the literature and explore the under-representation of African American females in higher education leadership and their career development.

### Women's Progression into Higher Education

In studying the factors that influence females' selection of higher education leadership as a career choice, it is important to understand the historical and contemporary challenges facing women in higher education. Waring (2003) stated that "the bulk of the research on women as leaders and managers focuses on women in corporations" (p. 3). In addition to the focus on corporate female leaders, current research and literature on leadership continues to focus on the male experience (Education Resources Information Center, 1997). The following section will provide an overview of the entrance of women into higher education.

**Women as Students.** Women did not attend the first American institution of higher learning Harvard, nor were they part of the faculty and staff in 1636, when Harvard was founded (Harvard, 2012). By the end of the 19$^{th}$ century, the face of higher education had changed. The most visible change was the gender and racial composition of the college student population, primarily due to the founding of women-only colleges

and historically black colleges and universities. Women-only colleges were established because male-dominated colleges would not admit women. Several prestigious and academically rigorous colleges were established to educate women only. In the 19th century, the following women's colleges were established: Vassar (1865), Wellesley (1870), Smith (1871), Bryn Mawr (1885), and Mount Holyoke (1888) (ERIC, 1997). Founders of the most prominent women's colleges tried hard to maintain curricula that matched or exceeded the curricula at men's colleges (Jacob, 1996). The number of women enrolled in higher education institutions increased by almost 800% between 1870 and 1900 (ERIC, 1997). Alvarez and Kim (1995) stated that the "Women's College Coalition reported that women's colleges place a high value on women's career accomplishment and encourage their career aspirations by developing their self-confidence" (p. 644).

College attendance patterns for females began to increase by the beginning of the 20th century. Women's enrollment at co-educational colleges and universities peaked at slightly over 47% in 1920 and by 1930 approximately 15% of Ph.D.'s were awarded to women (ERIC, 1997). Forty percent or more of undergraduate students were women during the 1930s and 1940s (ERIC, 1997). Coontz (2009) stated that "for the first 70 years of the 20th century, female college graduates were much less likely to marry than women with less education" (p. 1). Jacobs (1996) suggested that during the 1950s women were drawn into college by financial value of the "Mrs. Degree". Traditionally, men were the financial leaders in the household and a college education was the pathway to career advancement and higher salaries (Tyler, 2002). Goldin (1996) asserted that

college attendance increased the chances of women marrying a college educated husband with high earnings. Smith (1990) stated that:

> In the 1960s and 1970s many women's colleges became coeducational, because it was believed that there were not enough women students who would be sufficiently convinced of the benefits of a women's college in the face of the many coeducational opportunities opened to them during this period. (p. 181)

Alvarez and Kim (1995) stated that:

> The women's liberation movement of the 1960s and 1970s stimulated widespread social attitudes and established legal conditions that make the position of single-sex colleges untenable, because some argue that separate education is inherently unequal, un-natural and hindering of students' development in college. (p. 641)

Although the existence of women-only colleges and enrollments began to decline after 1960, it did not discourage the enrollment of women at co-educational institutions. When the 1970s feminist movement arrived, women were encouraged to seek college degrees and careers for themselves. The feminist movement began as a group of women who demanded social reform for equal opportunities and access for women in all areas of society. The women's movement sought to emancipate women, but it spoke primarily to the needs of middle-class, white women, not to most African American women (Zamani, 2003). Most African American women during that time worked or had worked outside the home; however, many had not attended college at the same rate as white women.

Ethington, Pascarella, and Smart (1988) stated that "women social reforms were called for in an effort to overcome the sex segregation that has historically typified the American occupational structure and inhibited women's access to higher status and

income occupations" (p. 545). Key legislation was passed as a result of the women's and civil rights movements: the Equal Pay Act of 1963 prohibits sex discrimination; Title VII of the Civil Rights Act of 1934 and Executive Order 11375 in 1967 prohibits discrimination in employment. The most significant educational legislation that helped women progress in higher education was Title IX of the Educational Amendment of 1972, which barred discrimination in federally assisted educational programs (Ethington et al., 1988). Ethington et al. (1988) stated that "the legislation mandating equal educational opportunity for women was vital for social reform. Without the requisite educational background, women would still be denied entry into the more prestigious occupations customarily held by men" (p. 546).

The student population trends for women participating in higher education also experienced growth. By the end of the 20th century, women had exceeded the college graduation and attendance rates of men. The American Council on Education (ACE) reported in 2011 that women now receive more doctoral degrees than men (Kim, 2011). A 2012 National Center for Education Statistics (NCES) report indicated the following:

> Differences in educational attainment by gender have shifted over the past few decades, with female attainment now greater than male attainment at each education level. For example, in 1980, the percentages of males (85 percent) and females (86 percent) who had completed at least high school or equivalency were not measurably different, but in 2011, the percentage of females (91 percent) was higher than the percentage of males (87 percent) by 3 percentage points. The percentage of females (21 percent) who had attained at least a bachelor's degree was 3 points lower than the percentage of males (24 percent) in 1980, but in 2011

the percentage of females (36 percent) was 8 points higher than the percentage of males (28 percent) (p. 1).

The increase in educational attainment, particularly among women with doctoral degrees, may lead to an increase in female higher education leaders.

**Women as Higher Education Administrators.** Between 1975 and 2009, women began to change the demographic profile of higher education administration. In 1975, Dr. Lorene Rogers of the University Texas at Austin (UTA) led the way for 20th century female college presidents by becoming the first woman to lead any major university in the United States, one of the more prestigious occupations customarily held by men (Hevesi, 2009). In 1994, Dr. Judith Rodin served as the first female Ivy League president at the University of Pennsylvania (Penn), serving from 1994 to 2004. Ivy League universities are a group of eight American universities that are highly selective, limiting their admissions to 20% of applicants. The Ivy League includes Brown, Columbia, Cornell, Dartmouth, Harvard, Princeton, Pennsylvania, and Yale. Other women would follow representing four of the eight Ivy Leagues institutions: Dr. Ruth Simmons of Brown, 2001 to 2012; Dr. Shirley Tilghman of Princeton, 2001 to 2013; Dr. Amy Gutmann of Pennsylvania, 2004 to present, and Dr. Drew Faust of Harvard, 2007 to present (Alderman, 2007).

Martin (2011) stated that "in spite of a couple decades of clear progress in the advancement of women in leadership positions, the last 15 years have really been stagnant at many institutions of higher education" (p. 1). Despite the progression of women as presidents at four of the eight Ivy League universities, the college presidency is still a male dominated role. The 2013-2014 *Chronicle of Higher Education Almanac*

reported that women made up 22.3% of college presidents at 250 public and private 4-year institutions surveyed in 2012. The *Chronicle* (2012) also reported that women accounted for 39.9% of chief academic officers and 43.3% of all other senior administrators.

**The Gap between Female Students and Institutional Leaders**

Although women have made modest gains in higher education leadership, there is a growing gap between the female student population and women in leadership positions, particularly the college presidency in the United States. In fall 2009, women comprised 57% of undergraduate enrollment and 59% of graduate enrollment, yet women only represented 23% of all college presidents (Curtis, 2011). Further, Martin (2011) stated that "women earn a majority of master's degrees and nearly half of all doctoral degrees handed out at U.S. colleges, yet they only make up a small percentage of full-time professors and one-fourth of university presidents" (p. 1). The U.S. Department of Education estimates that, "by 2014, women will earn 60 percent of all bachelor's degrees and will earn a majority of professional and doctoral degrees" (Perry, 2005, p. 1).

Academic researchers support the concept of increasing and improving diversity and inclusion of women and minorities, particularly in these times of shifting demographics. Kiley (2011) stated the following:

> One change that has become clear in research is that within organizations that have many female leaders, future female leaders are more likely to emerge. Simply seeing other women in leadership roles and becoming aware that they are a possibility. What will happen for students, men and women is that their

perception of leadership will broaden in terms of different styles and qualities of leadership instead of gender being a big deal. (p. 3)

This study attempted to identify the reasons why few female African American doctoral students in higher education administration presumably do not aspire to or experience barriers in becoming higher education leaders. If women continue to make up the college enrollment majority, could there be more pressure to hire women in decision making positions (Tyler, 2002)?

## History and Career Development of African American Women in Higher Education

Do African American women who aspire to become higher education leaders perceive barriers to leadership and do they have career support systems? Do African American women face unique challenges and barriers on their path to higher education leadership? This study will examine female African American doctoral students' perceptions about self-efficacy, career outcome expectations, vocational interests and barriers and supports with respect to the higher education administration profession. The following section will provide an overview of the history and career development of African American women in higher education.

**Historical Background.** Prior to the Civil War, higher education for African American students was virtually nonexistent (Purnell, 2012). Solomon (1985) stated that "in the late nineteenth and early twentieth century, the black college woman was the exception of the exceptions in that neither black nor white colleges wanted her" (p. 76). In 1850, Oberlin College in Ohio awarded the first bachelor's degree ever earned by an African American woman in the United States (Slater, 1994). The first historically black college and university (HBCU), Lincoln University in Philadelphia, Pennsylvania did not

admit women in 1854 when it was founded. In 1897, the all-women's college, Vassar College unknowingly graduated its first African American woman, Anita Hemmings even though African Americans were not admitted (Slater, 1994). According to Vassar's records, the college expressed outrage when it learned that Ms. Hemmings admitted to being African American after graduation; however, the college did not rescind her degree (Slater, 1994). African Americans who were awarded degrees during the mid-to-late 19th century were mostly light skinned African Americans who kept their identities secret for fear of rejection (Slater, 1994). Chamberlin (1991) noted "prior to World War II, information regarding minorities in higher education was limited" (p. 9). One of the contributing factors to making information available was the 1954 Brown vs. Board of Education (Brown vs. Board) decision (Green, 1988). Brown vs. Board was the first step in achieving equal education for all students. Green (1988) stated that "the Civil Rights Movement of the 1960's increased the necessity of institutions of higher education to accept more students, and subsequently hire more minority faculty and administrators" (p. 120). According to the 2013-2014 *Chronicle of Higher Education Almanac*, African Americans accounted for 13.3% of undergraduate and graduate students enrolled in 4-year institutions, to include research, master's baccalaureate and special focus institutions. The *Chronicle* (2013) also reported that among African Americans, African American women comprised 65.9% of Bachelor's degrees awarded in 2010-11, 70.8% of Master's degrees and 65% of doctoral degrees. According to a 2012 NCES report, "African American college enrollment is projected to increase 25% between 2010 and 2021" (p. 71). Zamani (2003) stated that "despite the increasing proportion of African American students enrolling in post-secondary education, debates about the extent to

which all college students have equal access to opportunities for success continues" (p. 6).

Historical data on African American women as higher education administrators are limited. In 1955, Willa Player became the first African American woman to become a college president. Since Dr. Player's appointment, African American women have made great contributions to the academy. In 1999, Dr. Shirley Jackson became the first female African American president ever appointed to a major research university, Rensselaer Polytechnic Institute (Slater, 1994). In 2000, Dr. Ruth J. Simmons was appointed president of Brown University, the first African American woman president at an Ivy League institution (Jackson & Harris, 2007). By 2007, there were "117,327 black women in professional positions on campus, including 12,772 executives or managers and 49,077 faculty" (Dawkins, Glover, & Jones, 2010, p. 22). Dawkins et al. (2010) further stated that "African American women are the largest employee minority group in higher education, chiefly at public, 4-year and 2-year schools" (p. 22). Lloyd-Jones (2012) stated that "women of color have a long tradition of leadership as founders, presidents, deans and department chairs at HBCU's, especially those that initially targeted women students" (p. 1).

**Recruitment of African American Females in Higher Education Leadership Roles.** *The 2013-2014 Chronicle of Higher Education Almanac* reported that of the 250, 4-year institutions surveyed, African Americans accounted for approximately 6.4% of all college presidents, 3.9% of chief academic officers and 7.9% of all other senior administrators (*Chronicle*, 2013). Henry and Glenn (2011) suggested that African American women continue to be under-represented in both faculty and administrative

positions within the academy and their ability to overcome the obstacles that result from systemic racism is impeded by this under-representation. An institution's recruitment practices seem to play a critical role in how its members approach diversity, with respect to race and gender. Higher education leadership panelists from the 2013 American Council on Education Conference (ACE) addressed diversity and inclusion during the conference and asked participants the following question: "Who will fill vacancies as they arise and how current administrators and institutional governing boards will ensure that the next generation of leaders have the aptitudes necessary to tackle the litany of challenges that await them in the top campus jobs" (Kiley, 2013, p. 1)? The ACE panelists suggested that:

> When it comes to the recruitment of racial and ethnic minorities the trends are less promising. Aside from chief diversity officers -- 89 percent of whom are people of color -- racial and ethnic minorities make up at most 17 percent of any given senior administrative role (in higher education). Only 7 percent of provosts or chief academic officers, still the most common stepping stone to the presidency, are people of color. (p. 1)

Jorge G. Gonzalez, vice president of academic affairs, dean at Occidental College and an ACE Fellow and panel member commented that "if this is the pipeline we're going to look at, then in 10 years the numbers are going to be absolutely abysmal" (Kiley, 2013, p.1). Kiley (2013) further commented that "even when ethnic and racial minorities reach the ranks of senior administration, barriers prevent them from becoming presidents" (p. 1).

**Career development of African American women.** The lack of studies regarding the career development of African American women makes it difficult to outline a clear path of progression to higher education leadership. Certainly, the lack of studies may be due to the lack of representation of African American women in higher education leadership roles. Caldwell and Watkins (2007) stated that "when examining the presence of African American women in higher education, it is important to be aware of their service in traditional education positions and lower to mid-level management, as well as their absence from leadership positions in academic environments" (p. 1). Madsen (2007) suggested that "understanding the influences, backgrounds, and career paths of women who have succeeded in obtaining and maintaining powerful positions of influence within higher education is essential in deepening and broadening our understanding of leadership development as a whole within higher education" (p. 184).

In a career development study, African American researchers Battle and Doswell (2004) interviewed 12 female African American college presidents. The purpose of their study was to understand the career paths of these college presidents. Their study found that the college presidents' career paths were different from the majority of college and university presidents (Battle & Doswell, 2004). According to Battle and Doswell, the majority of college and university presidents take a more traditional career path, "first being a faculty member, then a dean, then a provost, and then a campus head" (p. 11). Battle and Doswell suggested that "African American women's non-traditional career path to the presidency may explain why they tend to head lower status colleges and universities" (p. 11).

Another finding from this study was that "while community colleges are perceived to be lower status institutions, African American women have had slightly more success in achieving the presidency in these institutions than in four-year colleges and universities" (Battle & Doswell, 2004, p. 14). Most of the presidents in their study had a strong commitment to working with students who had a hard time gaining access to postsecondary education. The presidents in this study advanced from "administrative support positions unlike the majority of male presidents who spent some time in the faculty" (Battle & Doswell, 2004, p. 13). Battle and Doswell's (2004) findings included the following recommendations for African American females who might be interested in becoming a college or university president:

1. Consider a doctoral degree in an academic discipline instead of Education.
2. Try to choose a dissertation advisor who will be an advocate for you as you go on the job market.
3. Be very careful about your first job; consider the type of institutions. For example, career ladders in higher education make it difficult to move between two-and four-year institutions.
4. Spend some time as a faculty member.
5. Get a mentor.
6. Develop a professional reputation as a hard and good worker.
7. Think about the best way to be an advocate for African American and other minority students.
8. Develop alliances with other women and people of color to keep informed about professional opportunities and ways to support one another. (pp. 14-15)

**African American women barriers and support.** This study also sought to identify barriers and supports that may be perceived by female African American doctoral students in higher education administration. Lloyd-Jones (2011), an African American associate professor and associate department chair of human relations at the University of Oklahoma, conducted a study which focused on the career development of African American women. Lloyd-Jones asserts that "isolation, loneliness and lack of trust compound the effects of racism and sexism as barriers to African American women's full participation in the upper levels of academia" (p. 2). Lloyd-Jones further asserts that "African American women need to be politically aware of the operation of race and gender in their specific organizations; they need to develop such political skills as setting an agenda, mapping the political terrain, networking, forming coalitions, bargaining and negotiating" (p. 4).

Brown (2011) recommended that women should do the following to increase their chances of becoming a senior administrator:

1) Serve in other leadership roles, i.e., chair committees;
2) Approach independent colleges for opportunities because they seem to be more open to considering a variety of administrative and academic experiences;
3) Consider serving on accrediting bodies;
4) Present at academic conferences;
5) Publish and;
6) Participate on boards of professional, national and civic organizations and in professional programs and get into mentoring. (p. 7)

Although there have been several "firsts" for African American women in higher education, African American women continue to be under-represented in higher education leadership. Zamani (2003) stated that "African American women traditionally have been preceded by white men, white women and African American men in importance and standing" (p. 7). The demographics of higher education are rapidly changing with respect to minority enrollment. With such change occurring, should the higher education community become more proactive in its focus on diversity and recruiting African American females into positions of leadership? Hamilton (2004) stated that observers agree that, as these demographic changes continue, more leadership opportunities for women, particularly women of color, will open up. How will the higher education community encourage African American women who aspire to become higher education administrators, when women who look like them are not prevalent in higher education leadership roles? Dr. Yolanda Moses, former president of City College of New York stated that "the glass is only half-full for women of color who aspire to leadership. What's changed is that there are more women and there's more willingness to give them a chance. What hasn't changed is that institutional structures die hard" (Hamilton, 2004, p. 63).

**Social Cognitive Career Theory**

This study will employ the social cognitive career theory (SCCT) to examine female African American doctoral students' career self-efficacy, outcome expectations and vocational interests. If a researcher is interested in prediction of career choice in a specific area of study, such as higher education leadership, he or she will need measures of self-efficacy expectations, outcome expectations, and interests relative to that field

(Betz & Hackett, 2010). SCCT is a framework developed by Robert Lent, Gail Hackett and Steven Brown (Lent, Hackett, & Brown, 1994). SCCT was derived from Albert Bandura's social cognitive theory (SCT) which focuses on "the degree that an individual's environment and social systems affect his/her aspirations, self-efficacy beliefs, and other self-regulatory influences" (Pajares, 2002, p. 2). Bandura (1982) posits that people learn behaviors by observing others and continue a behavior if they are rewarded and that deep thought about one's abilities (self-efficacy) influences an individual's behavior. Bandura explored behavior development and wrote a book in 1986 introducing a social cognitive theory (SCT) of behavior. Bandura developed social cognitive theory to understand how people learn new behaviors. SCT acknowledges biological and environmental factors of human functioning; however, it does not overemphasize the role that environment factors play in the development of human behavior (Pajares, 2002). Bandura (1986) posits that an individual's environment affects his/her beliefs about how self-efficacy occurs as well as the outcome. Further, self-efficacy was theorized to be due to its influence on an individual's intention to persevere or to give up, thus influencing future behaviors by increasing or decreasing exposure to new and challenging tasks.

Internal human behavior processes are typically viewed as not having a direct effect on behavior, but rather transmitting it (Pajares, 2002). In essence, individuals are able to persist in an endeavor with or without external stimuli. SCCT incorporates three central variables into general SCT: (a) self-efficacy, (b) outcome expectations, and (c) personal goals; these variables are considered the building blocks of career development (Lent et al., 1994). Lent et al. (1994) theorized that an individual attempts many

different activities through his/her educational career, but generally a persistent interest is only developed in activities in which the person expects to be successful and in which a positive outcome is anticipated. Interests are thought to predict an individual's goals and thereby he or she pursues the goal according to his or her interest. An individual's performance in his or her interests is predicted by the behaviors pursued and his or her self-efficacy beliefs. An individual's experiences of success and failures in his or her career choice or educational field then contribute to his or her future self-efficacy. Lent et al. applied Bandura's SCT to career and academic outcomes and thereby developed the social cognitive career theory (SCCT). Lent et al. were interested in prediction of career choice in a specific area of study. The SCCT model attempts to explain why people become interested in different academic and vocational domains, why they experience success or failure, and why they eventually choose particular academic or career behaviors (Lent et al., 1994). SCCT more clearly explains that self-efficacy directly influences performance of a task (Lent et al., 1994). The following figure illustrates Lent et al. (1994) social cognitive theory model of performance:

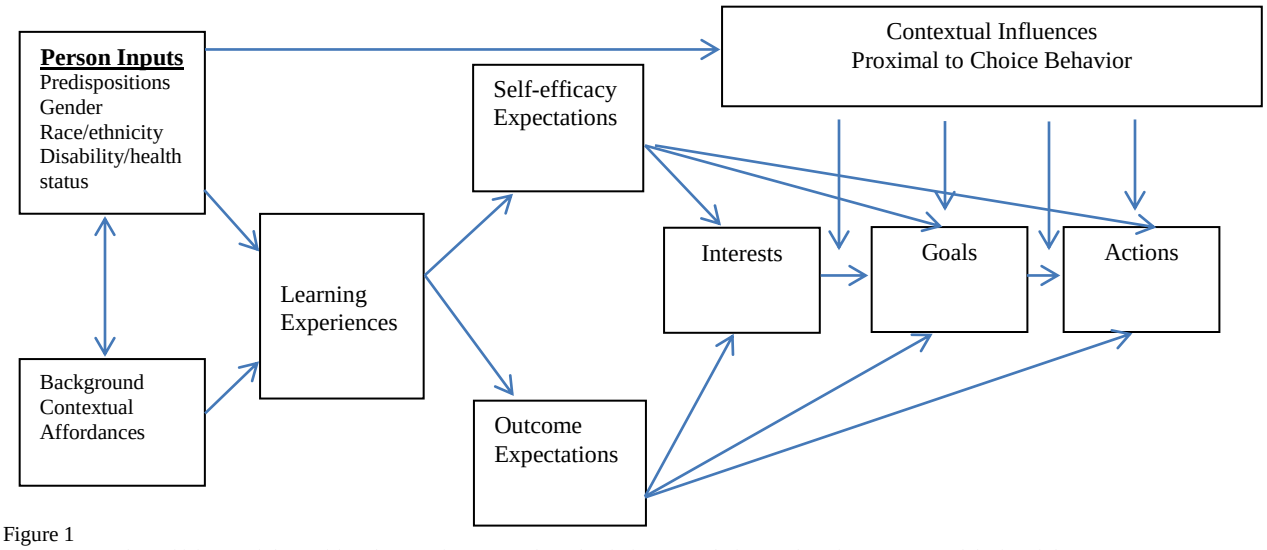


Figure 1
From "Toward a unifying social cognitive theory of career and academic interest, choice, and performance: Model of social cognitive influences on career choice behavior" by R.W. Lent, S.D. Brown, & G. Hackett., 1994, *Journal of Vocational Behavior*, 79-122. Copyright 1994 by R.W. Lent, S.D. Brown, & G. Hackett. Reprinted with permission.

**Self-Efficacy.** SCCT focuses on several "cognitive-person variables (e.g., self-efficacy, outcome expectations, and goals/vocational interests) and how these variables interact with other aspects of the person and his or her environment (e.g., gender, ethnicity, social supports, and barriers)" (Lent et al., 2000, p. 36). Self-efficacy beliefs contribute to the creation and selection of educational pursuits and career paths. Perceived self-efficacy is behavior that involves implementing action based on confidence in knowledge (Bandura, 1986). For example, an individual may have high self-efficacy about his or her ability to teach students about higher education leadership, but a very low self-efficacy about leading a higher education institution. Unlike relatively stable traits such as self-esteem, an individual's self-efficacy beliefs may vary significantly based on the task (Lent et al., 1994). The social cognitive career theory (SCCT) posits that individual judgments about self-efficacy are based on four major sources: 1) performance accomplishments, 2) learning by observing others, 3) verbal persuasion, and 4) physiological states and reactions (Savickas & Lent, 1994). Self-efficacy will be included in this study to consider a student's perceived ability to complete the requirements for entry into the higher education leadership profession. For purposes of this study, the assumption is that a doctoral student who has greater self-efficacy is more likely to persist towards their expected outcome.

***Performance accomplishments***. Performance accomplishments are the highest level of self-efficacy. Consistent with self-efficacy theory, mastery or successful past performance produces the highest, strongest, and most generalized increases in coping efficacy (Bandura, 1982). Coping self-efficacy is defined as "a person's subjective appraisal of his/her ability to cope with the environmental demands of a stressful

situation" (Benight, 1996, p. 133). The assumption is that the more an individual engages in a challenging activity, the greater his or her perceived self-efficacy in performing that activity. In contrast, an individual's self-efficacy is likely to decrease if he or she repeatedly fails at a task and those failures cannot be attributed to external circumstances, making it less likely that the individual will attempt the task again. Once an individual has a strong belief about his or her efficacy at a particular task, he or she will be influenced less by failure. Also, additional efforts made toward a particular task can strengthen efficacy with respect to overcoming obstacles and barriers (Bandura, 1986).

***Learning by observing others.*** Another major source of self-efficacy is learning by observing others, also known as vicarious learning. This source of self-efficacy is theorized to be quite strong, but assumed to be weaker than self-efficacy resulting from performance accomplishments (Bandura, 1986). Vicarious learning occurs by observing others persist in an endeavor, thereby confirming for the observers that they too can persist in that same endeavor. An individual may convince himself or herself that if others can do it, he or she should be able to achieve at least some improvement in performance (Bandura, 1986). This is one reason why having African American female role models in higher education leadership positions is important. Kiley (2011) stated:

> One change that has become clear in research is that within organizations that have many female leaders, future female leaders are more likely to emerge. Several factors play into this, including direct mentoring relationships, but it's mostly the result of younger women simply seeing other women in leadership roles and becoming aware that they are a possibility. (p. 4)

Conversely, if an individual sees others from a peer group fail, especially after investing a significant amount time and effort, the individual's beliefs about his or her own self-efficacy is theorized to decrease (Bandura, 1986). Bandura (1986) also theorizes that if an individual has had mixed experience with a task, he or she will likely have more self-doubt and therefore places a higher value on learning by observing others. While learning by observing others is expected to influence self-efficacy less than performance accomplishments, this source can influence a person to avoid tasks that would provide information about personal performance (Bandura, 1986). Bandura (1986) theorizes that if an individual begins to avoid tasks, he or she will likely maintain low self-efficacy for a particular task without having actually tried it.

***Verbal persuasion***. The third source of self-efficacy is verbal persuasion. When a supervisor, peer or family member expresses an opinion to an individual regarding his or her ability to perform a task this is referred to as verbal persuasion. Verbal persuasion has the greatest impact when it can encourage or discourage an individual from attempting a particular task (Bandura, 1986). Verbal persuasion can serve as a motivator, particularly if an individual is unsure of his or her efficacy. Bandura (1986) posits that once an individual has a strong sense of self-efficacy for a task, verbal persuasion has much less influence. This kind of persuasiveness increases self-efficacy and leads people to persevere enough to succeed, which promotes development of skills and competencies (Bandura, 1986). Bandura theorizes that verbal persuasion makes an individual feel like he or she has "what it takes" to persist and succeed.

***Physiological states and reactions*.** The final source of self-efficacy is physiological states and reactions. Bandura (1986) theorizes physiological state as the

amount of anxiety an individual experiences while performing a specific task. An individual's physiological state and reactions are an emotional arousal which provides another consistent source of efficacy information (Bandura, 1986). People rely on their emotions to evaluate their capability and vulnerability to stress. For example, the emotion of fear causes an individual to elevate levels of distress that produce the very dysfunction they fear (Bandura, 1986). This source of efficacy information is important because people tend to perceive psychological and/or emotional activations as signs of vulnerability and dysfunction (Stajkovic & Luthans, 1998). Bandura theorizes that anxiety caused by individuals' physical state cause them to be preoccupied with worry which makes them unable to perform the task as successfully as if they had not been distracted.

The four major sources of self-efficacy as perceived and processed by an individual affect the strength of his or her self-efficacy beliefs (Bandura, 1986). Bandura (1986) theorizes that when an individual has a well-established efficacy belief, whether it is for success or failure, the sources of self-efficacy will remain more stable. Further, the four sources of self-efficacy influence the development of an individual's self-efficacy and influence his or her expectations and behaviors (Bandura, 1986).

**Outcome Expectations**

Bandura (1986) defines outcome expectation as "a judgment of the likely consequence a behavior will produce" (p. 391). For purposes of this study, outcome expectations refer to what will happen after the doctoral students enter their profession. In other words, the expectations are what the students expect to happen after they complete their studies in higher education administration. What are the perceived

barriers and external factors they may encounter? A higher education administration doctoral graduate may have outcome expectations related to an entry-level position that includes monetary expectations, expectations of group acceptance and self-satisfaction (Lent et al., 1994). Miller and Brickman (2004) stated that "the greater the personal value of the anticipated outcomes and the stronger the belief that one is capable of generating the behaviors needed to obtain the outcomes (self-efficacy beliefs), the greater the likelihood that action will be taken to obtain them and that effort will be expended in their pursuit" (p. 11).

Bandura (1986) posits that if an individual believes he or she will be successful at a specific task, he or she will hold positive outcome expectations. Conversely, if an individual anticipates failure at a task, his or her outcome expectations will be the consequences of failure. This study explored the outcome expectations of female African American doctoral students in higher education administration programs.

**Personal/Career Goals and Vocational Interests**

SCCT asserts that personal goals influence a person's behavior (Lent et al., 1994). By setting personal goals, an individual may focus on obtaining an expected outcome, such as becoming a higher education leader. Setting goals motivates an individual to attain his or her goals. Self-efficacy, together with outcome expectations and personal goals, increases the likelihood of attaining the goal (Bandura, 1986). For purposes of this study, career choice goals refer to the study participants' vocational interests and intentions to pursue higher education leadership as a profession. This study examined and measured the behaviors needed to attain the career choice goal, as identified by the variable, vocational interests.

**Barriers and Supports**

SCCT asserts that if an individual perceives significant barriers to an expected goal he or she is less likely to persist or he or she develops weaker interest (Savickas & Lent, 1994). Do female African American doctoral students enrolled in higher education administration programs perceive significant barriers and experience support in becoming higher education leaders? SCCT focuses on the self-system and the individual's beliefs about his or her ability to succeed. Therefore, an individual's self-efficacy expectations directly impact his or her outcome expectations, such as career attainment (Savickas & Lent, 1994). SCCT emphasizes that an individual with a slightly over-confident sense of his or her skill level is more likely to be successful and gain greater efficacy (Ahuja, 2006). Lent et al. (1994) acknowledged that "an individual's career development will be impacted by perceived supports, opportunities and barriers and that these will vary by person and situation" (p.79). Support systems promote behavior that enables individuals to strive in achieving their career choice goal, whereas barriers hinder goal attainment. This study examined and measured doctoral students' behavior as it relates to their perceived barriers and support to enter higher education leadership.

Much of the research on SCCT has been applied to academic areas such as math and science (Fouad, Smith, & Zao, 2002; Smith & Fouad, 1999). Fouad et al. (2002) stated that the "reason for this focus is in part due to the concerns over the past 2 decades regarding the under-representation of women and minorities in these fields and the suggestion that self-efficacy interventions may ameliorate the under-representation" (p. 164). Fouad and Smith (1996) conducted a study to test SCCT for middle school students in math and science. In that study, "the analysis suggests that among the middle

school population, there are small, but significant effects of person inputs (gender and age) on outcome expectations and interests in mathematics and science, but no such effects on self-efficacy" (p. 343). Although SCCT has been applied to math and science of middle school students, there is no literature applying the SCCT to higher education administration doctoral students. Hayes (2008) expounded on Cunningham et al. (2005) study by applying SCCT to African American undergraduates who select public accounting as a career choice. In that study, support was found that a positive relationship exists between outcome expectations of the public accounting profession and the decision to select public accounting as a career choice. This study will expound on research conducted by Cunningham et al. (2005) which focused on undergraduate college students' sport science and leisure career choices. Cunningham et al. (2005) study results demonstrated general support for the SCCT model in terms of the effects of cognitive-person variables. Specifically, the study "predicted, (a) self-efficacy was related to outcome expectations and vocational interests; (b) outcome expectations and satisfaction were related to vocational interests; and (c) vocational interests held a positive association with goals" (p. 133). This study hopes to add to the SCCT literature by applying SCCT to higher education administration doctoral students.

**Justification of Research Questions**

The aim of this study was to identify reasons why African American women who are enrolled in higher education administration doctoral programs intend to become senior higher education leaders, i.e., college presidents, chief academic officers and vice presidents. The literature reflects an under-representation of female African Americans as senior administrators in higher education. The significance of this issue is worthy of

study. The research questions guiding this study are designed to identify those important reasons, which may result in encouraging African American females to pursue higher education leadership careers. Research questions 1 and 2 seek to identify the self-efficacy and outcome expectations of female African American doctoral students enrolled in higher education administration programs. As stated earlier, self-efficacy is defined as "people's judgments of their capabilities to organize and execute courses of action required to attain designated type of performances" (Bandura, 1986, p. 391). By identifying the doctoral students' self-efficacy and outcome expectations, the results may explain their pursuit or lack of pursuit of higher education leadership careers.

Research questions 3 and 4 are designed to determine if there is a relationship between self-efficacy and the selection of higher education leadership as a career choice and a relationship between outcome expectations and the selection of higher education leadership as a career choice. Bandura (1986) posits that if an individual believes he or she will be successful at a specific task, he or she will hold positive outcome expectations. Conversely, if an individual anticipates failure at a task, his or her outcome expectations will be the consequences of failure. By determining if there is a relationship between these variables, the researcher was able to predict whether there is a negative or positive relationship between the variables.

# Chapter 3

## Research Design and Methodology

Chapter 3 outlines the research design and methodology that was used for this study. This chapter describes (a) the research design; (b) population and sample; (c) ethical considerations, confidentiality and risks; (d) instrument; (e) data collection; and (f) data analysis. The primary purpose of this quantitative study was to survey female African American higher education administration doctoral students to determine their career self-efficacy and outcome expectations of the higher education leadership profession with their selection of higher education leadership as a career goal. The intent was to determine if a relationship existed between the independent variables (self-efficacy and outcome expectations), and the dependent variables (vocational interests, barriers and supports).

Creswell (2009) stated that "quantitative research is a means for testing objective theories by examining the relationship among variables" (p. 4). Ouyang (2012) stated that "quantitative research is categorized with descriptive research, correlation+nal research, causal-comparative research and experimental research; it collects numerical data in order to explain, predict and or control phenomena of interest; and data analysis is mainly statistical" (p. 1). For purposes of this study, a descriptive correlational approach to quantitative research was employed. Ouyang (2012) also stated that "descriptive research involves collecting data in order to test hypotheses or answer questions concerning the current status of the subjects of the study and that correlational research attempts to determine whether and to what degree a relationship exists between two or

more quantifiable variables" (p. 1). This study sought to collect data for the purpose of testing hypotheses and answering the research questions.

## Research Design

The primary purpose of this quantitative research study was to survey female African American doctoral students in higher education administration programs at select 4-year, public universities to describe and correlate their career self-efficacy and outcome expectations of higher education leadership with their selection of higher education leadership as a career goal. The quantitative research method was chosen because it answered the research questions and tested the relationships between this study's variables.

**Population and Sample.** The sampling design for this study was multistage sampling. In a multistage procedure, the sample was selected in more than one step (Hinkle, Wiersma & Jurs, 2003). In this study, the sample was selected from the population in a three-stage sampling method. For example, the first stage involved selecting the area of 4-year, public universities located in the southern part of the United States. For purposes of this study, the southern United States shall include, Alabama, Arkansas, Florida, Georgia, Mississippi, North Carolina, South Carolina, Tennessee, and Texas. The second stage involved selecting a doctoral program, higher education administration. The third stage involved selecting doctoral students within the program based on gender and race: female and African American. Therefore, the population for this study consisted of all female African American doctoral students enrolled in higher education administration programs at select 4-year public universities located in the southern United States. Based on contacts made with the institutions, the population

included 362 female African American students who were available for inclusion in the survey. Hinkle et al. (2003) stated that "a population includes all members of a specified group and that a sample is a subset of a population that is selected and only members of the sample are included in the research study" (p. 14). All members of the population were approached for possible inclusion in the sample. The final description of the sample reported in the section on Results in Chapter 4.

The students were recruited through their respective university's office of institutional research and institutional research board (IRB). The offices of institutional research and IRBs at the target public universities were contacted and the study discussed. They were asked if they would be willing, upon the study's approved IRB at the University of Memphis, to forward emails requesting participation in the study on to the individuals who fit the sampling criteria. The institutional research and IRB contacts requested a completed data request form located on their department website and documentation of IRB approval. The offices of institutional research and IRB contacts appear in Appendix A and comprise 18-four-year-public universities, with a combined population of 362 female African American doctoral students enrolled in higher education administration. (see Appendix A).

**Ethical Considerations, Confidentiality and Risks**

This study had some ethical considerations. First, study participants were not be harmed in any way (physically or mentally) in the name of science. Second, study participants were completely informed concerning the nature of any risk and the permission for participation in the survey, which was acquired in writing. The names of study participants were not obtained during recruitment, nor data collection and were not

to be reported in the study findings. The names of the universities included in the study were identified in Appendix A.

Third, the study protocol was reviewed and approved by the Human Subjects Review Board of the University of Memphis (see Appendix H for approval). The potential risks for participants in this study were minimal. Information provided on survey questionnaires is anonymous. Any identifiable details of the individual taken from the Consent Forms will be protected to the extent allowed by law.

**Instrument.** Creswell (2009) stated that "survey research provides a quantitative or numeric description of trends, attitudes, or opinions of a population by studying a sample of the population" (p. 12). This study used the social cognitive career theory (SCCT) survey questionnaire (Cunningham et al., 2005) to examine female African American higher education administration doctoral students' career self-efficacy, outcome expectations and career choice. Permission was obtained to use the SCCT survey questionnaire, September 16, 2012 from the developer, Dr. George Cunningham of Texas A&M University (see Appendix F). Cunningham et al. (2005) developed the SCCT survey questionnaire to study the application of social cognitive career theory to college students' sport and leisure career choices.

The underlying construct of the SCCT survey questionnaire is to measure self-efficacy. The SCCT survey questionnaire is divided into five categories, as presented in Table 1 and labeled the following: self-efficacy, outcome expectations, vocational interest, supports, and barriers. On the SCCT survey questionnaire, self-efficacy was measured by six items; outcome expectations will be measured by six items, with a focus on power and satisfaction; vocational interests was measured by four items; supports was

measured by six items, with a focus on social and human capital and barriers was measured by eight items, with a focus on discrimination and advancement opportunity. A copy of the SCCT survey questionnaire is included in Appendix E.

Cunningham et al. (2005) conducted a pilot study of the SCCT survey questionnaire prior to their research of undergraduate students' self-efficacy in the sports leisure field. Based on responses from that pilot study, six combined facets of outcome expectations, supports and barriers were developed, such as, power and satisfaction; social and human capital and discrimination and advancement opportunity, respectively (Cunningham et al., 2005). For purposes of this study, facets of Cunningham et al. (2005) pilot study, as identified in the following section, were included on the SCCT survey questionnaire.

Table 1
*Survey Categories and Number of Questions*

| Survey Categories | Number of Survey Questions |
|---|---|
| Self-efficacy | 6 |
| Outcome Expectations<br>• Power<br>• Satisfaction | 6 |
| Vocational Interests | 4 |
| Supports<br>• Social Capital<br>• Human Capital | 6 |
| Barriers<br>• Discrimination<br>• Advancement | 8 |

The facets of outcome expectations are satisfaction and power. The outcome expectation survey section measured satisfaction and survey questions was preceded by

the following phrases: "the opportunity to continue to be around higher education activities", "satisfaction from being in a higher education environment", "many benefits associated with higher education" (Cunningham et al., 2005, p. 127). The outcome expectation survey section also measured power and survey questions focused on the following phrases: "a good salary", "power in my job" and "the ability to hold a position of authority" (Cunningham et al., 2005, p. 127).

The facets of supports are social and human capital. The supports survey section measured social capital and survey questions was preceded by the following phrases: "I feel as if I have sufficient contacts to help me in entering higher education leadership", "I have a large enough network of contacts to make entering higher education leadership possible", "I do not have the contacts to help me earn a job in the higher education leadership field"; and "I feel as if I know enough people in the field to obtain a position within higher education leadership"(Cunningham et al., 2005, p. 129). For purposes of this study, most of the items in the SCCT survey questionnaire were phrased so that strong agreement indicated a belief that survey participants would have sufficient contacts to make entering higher education leadership; however, some items were phrased in the reverse. Items needed to reverse were labeled "reverse scored". The supports survey section also measured human capital using the following survey items: "I have sufficient previous experience to enter higher education leadership", and "my educational background has prepared me for a job in higher education leadership" (Cunningham et al., 2005, p. 129).

The facets of barriers are discrimination and advancement opportunities. The barriers section of the survey measured discrimination using the following survey items:

"It is possible I be treated differently within higher education leadership because of my demographics (e.g., age, sex, race)", "I anticipate facing discrimination in higher education leadership based on my demographics (e.g., age, sex, race)", and "I do not foresee being treated differently in higher education leadership based on my demographic characteristics" (Cunningham et al., 2005, p. 128). The barriers survey section also measured advancement and were preceded by the following phrase and the next four items, respectively: "within the context of higher education leadership", I feel as if I would be promoted quickly", "have a hard time advancing in the profession; "have several opportunities for career advancement"; and "have few chances to get ahead" (Cunningham et al., 2005, p. 128).

Connelly (2009) stated that "a survey is a system to collect information to describe, compare or explain knowledge, attitudes and behaviors" (p. 114). SCCT survey uses a Likert scale to gain information. A Likert scale "is a balanced response scale with an equal number of positive and negative responses" (Connelly, 2009, p. 133). Connelly also stated that "scales are used to measure a particular concept or variable of interest in a study, such as self-efficacy" (p. 133). A scale often has a total score in which all items are added to provide a measure of the level of that variable, such as high-to-low, for the person completing the scale and are presented in table form (Connelly, 2009).

The SCCT survey questionnaire uses a 7-point Likert scale. For purposes of this study, the following 7-point, response scale was used: 7-strongly agree; 6-agree; 5-agree somewhat; 4-undecided; 3-disagree somewhat; 2-disgree and 1-strongly disagree. The survey questionnaire will provide specific directions on how to complete the survey. In order to make the reverse scored items on the survey equal to the other items; they were

reversed scored. Reversed scored items identified on the survey were reversed scored after all data from participants was gathered. Scores were reversed using the most general method, which is to add the minimum survey score (1) to the maximum survey score (7) and subtract the actual survey response score (Martin & Acuna, 2002). When the survey items were reversed scored, the 1s become 7s and 7s become 1s, and all the scores in between became their appropriate opposite (6s into 2s, 5s into 3s, etc.).

**Reliability and Validity.** In Cunningham et al. (2005), the SCCT survey questionnaire was constructed and reliability was measured and demonstrated by the developer of the survey. Reliability refers to "whether scores to items on an instrument are internally consistent, stable over time and whether there was consistency in test administration and scoring" (Creswell, 2009, p. 233). Further reliability tests were conducted for this study by applying Cronbach's alpha (Alpha). Alpha is the most widely used objective measure of reliability (Tavakol & Dennick, 2011). Ritter (2010) stated that Alpha is calculated using the following equation (p. 7):

$$\alpha = \frac{k}{k-1}\left(1 - \frac{\Sigma Vi}{Vtest}\right)$$

Whereas "k" equals the number of questions on the survey; "Vi" equals the variance of scores on each question; and "Vtest" equals the total variance of overall scores on the entire test (Ritter, 2010). The researcher used SPSS to calculate Alpha. "Alpha was developed by Lee Cronbach in 1951 to provide a measure of the internal consistency of a test or scale; it is expressed as a number between 0 and 1" (Tavakol & Dennick, 2011, p.53). The closer Alpha is to 1.0, the greater the internal consistency (Gliem & Gliem, 2003). A commonly accepted rule of thumb is that an Alpha of 0.6 to

0.7 indicates acceptable reliability, and 0.8 or higher indicates good reliability (Gliem & Gliem, 2003). Very high reliability, 0.95 or higher is not necessarily desirable, as this indicates that the survey items may be entirely redundant (Tavakol & Dennick, 2011). The Alpha for this study will be reported in the section on Results.

Face validity was sought by asking a researcher experienced in higher education administration to review the SCCT survey questionnaire. Face validity is testing an instrument based on observation, meaning through the use of a subject matter expert. For purposes of this study, a Director of Student Advisement (Director) reviewed the instrument as a subject matter expert. The Director concluded that the survey was clear and identified questions that may lead to answering the research questions.

**Data Collection**

This study collected data through an online survey questionnaire. Creswell (2009) stated that in quantitative research "data collection may also involve creating a web-based or Internet survey and administering it online" (p. 146). SurveyMonkey.com is the "world's leading provider of web-based surveys" (SurveyMonkey, 2013, p. 1). The collected data for this study was collected using SurveyMonkey and the data integrated into SPSS statistical software to tabulate the data. SurveyMonkey was used because of the accuracy of collection versus mailing surveys and coding results manually. Once permission was granted by the Institutional Research Board (IRB) to conduct the study and contact doctoral students for this study, an email, along with a SCCT survey questionnaire hyperlink and a consent form were emailed to contacts at the 18 university offices of institutional research and IRB (see Appendices B & D, respectively) and these individuals emailed the information on to potential participants who meet the selection

criteria. The survey was emailed January 15, 2014. A second email was sent January 27, 2014 to institutions that did not respond to the initial email. A final follow-up email was sent February 20, 2014 to appeal to institutions that had not responded throughout the collection period. Study participants were given more than 3 weeks to complete the survey and received a reminder (see Appendix C) to complete the survey if they had not already done so. The guideline for collecting online surveys is 7-10 days (University of Texas, 2011). In this study, the survey remained open an extended period of time in an effort to increase participation.

The consent form informed potential study participants of the purpose of the study and request their participation in the study. Potential participants read the consent form and indicated "yes" if they agreed to participate before proceeding to the survey questionnaire. SurveyMonkey provided the number of surveys completed and collected.

**Data Analysis**

This section provides an overview of the procedures involved in analyzing the data for this study. This study employed a quantitative data analysis. Table 2 reflects the variables, hypothesis, research questions, items on the SCCT survey questionnaire and test statistics that were analyzed to answer the research questions:

Table 2
*Data Analysis*

| Variable Names & Hypothesis | Corresponding Research Questions | Corresponding SCCT Survey Label and Items | Test Statistics |
|---|---|---|---|
| Independent Variables 1 & 2:<br>Self-Efficacy<br>Outcome Expectations<br><br>Dependent Variables:<br>Vocational interests (behaviors to attain career choice goal)<br><br>$\boldsymbol{H1_0}$. There is no relationship between career self-efficacy and the decision to select higher education leadership as a career goal.<br>$\boldsymbol{H1_a}$. There is a positive relationship between career self-efficacy and the decision to select higher education leadership as a career goal. | Research Questions 1 & 3:<br><br>1. What is the career self-efficacy of female African American doctoral students enrolled in higher education administration programs at select 4-year public universities have related to the higher education leadership profession?<br><br>3. What is the relationship between the career self-efficacy of female African American doctoral students enrolled in higher education administration programs and their decision to select higher education leadership as a career choice? | Self-Efficacy<br>6 Items<br><br>Vocational Interests<br>4 items | Cronbach's alpha and Pearson product moment correlation |
| Independent Variable :<br>Outcome Expectations<br><br>Dependent Variables:<br>Barriers and Supports (beliefs about treatment)<br><br>$\boldsymbol{H2_0}$. There is no relationship between the outcome expectations of the higher education leadership profession held by female, African American higher education administration doctoral students and their decision to select higher education leadership as a career goal.<br>$\boldsymbol{H2_a}$. There is a positive relationship between the outcome expectations of the higher education leadership profession held by African American higher education administration and doctoral students and their decision to select higher education leadership as a career goal. | Research Questions 2 & 4:<br><br>2. What outcome expectations do female African American doctoral students enrolled in higher education administration programs at select 4-year public universities have as a result of selecting higher education leadership as a career choice goal?<br><br>4. What is the relationship between outcome expectations of the higher education leadership profession held by female African American doctoral students enrolled in higher education administration programs and their decision to select higher education as a career choice? | Outcome Expectations<br>6 items<br><br>Barriers<br>8 Items<br><br>Supports<br>6 Items | Cronbach's alpha and Pearson product moment correlation |

Inferential statistics were employed to make inferences about the characteristics of the population from knowledge of the corresponding characteristics of the sample (Hinkle et al., 2003). Hinkle et al. (2003) defines inferential statistics as "procedures for making generalizations about a population by studying a subset of the population, called a subset" (p. 736).

For this study, Pearson product moment correlation coefficient and Cronbach's alpha (Alpha) are statistical tests that were used to measure the relationship between the independent and dependent variables to answer the research questions and the instrument's reliability, respectively. Pearson helped the researcher determine whether there is a significant linear correlation or association between two variables and the strength of the association between two variables (Hinkle et al., 2003). Pearson, typically symbolized by "*r"* is a correlation coefficient "index that describes the extent to which two sets of data are related; it is a measure of the relationship between two variables" (Hinkle et al., 2003, p. 98). Hinkle et al. (2003) denote Pearson product moment by the following formula (p. 100):

$$r_{xy} = \frac{\sum ZxZy}{n-1}$$

Pearson does allow for hypothesis testing to determine if there is significant linear correlation between two variables. Creswell (2009) stated that "an interpretation of the results means that the researcher draws conclusions from the results for the research questions, hypothesis, and the larger meaning of the results" (p. 152). Hypotheses testing determined whether some supposed value for an unknown population parameter is justifiable (Hinkle et al., 2003). A hypothesis is "a conjuncture about one or more

population parameters" (Hinkle et al., 2003, p. 176). The null hypothesis ($H_0$) was tested against an alternative hypothesis ($H_a$), which includes the possible outcomes not covered by the null hypotheses. The $H_0$ states that there is no significant linear correlation or difference between variables, self-efficacy and vocational interests and outcome expectations and vocational interests. For this study, three valid hypothesis conclusions were proposed: there is no significant linear correlation($H_0$ ), there is a significant positive linear correlation ($H_a$) and there is significant negative linear correlation ($H_a$) (Hinkle et al., 2003).

The Pearson test statistic is the value of "*r"*. Pearson answered the following research questions: "What is the relationship between the career self-efficacy of female African American doctoral students enrolled in higher education administration programs and their decision to select higher education leadership as a career choice?" and "What is the relationship between outcome expectations of the higher education leadership profession held by female African American doctoral students enrolled in higher education administration programs and their decision to select higher education as a career choice?

If the test statistic is greater than the critical value, then there is significant linear correlation. Hinkle et al. (2003) defines critical value as "the value in the sampling distribution that represents the beginning of the region of rejection" (p. 734). The region of rejection is the area of the sampling distribution that "represents values for the sample mean that are improbable if the null hypothesis is true" (Hinkle et al., 2003, p. 181). In this study, the critical value depended on the significance levels (.05) and (.01) and the Pearson *"r"* value. Hinkle et al. (2003) assert that the most frequently used levels of

significance are .05 and .01. The significance or alpha level for all analyses in this study was .05 for research question 4 and .01 for question 3. At these significance levels, there is a 5% or 1% chance that the tests will find the alternate hypothesis to be possible when it is actually not, respectively. For this study, if the test statistic is lower than the critical value, the finding is not significant and the alternate hypothesis is not supported. If the test statistic is higher, the finding is significant, and the alternate hypothesis is supported (Hinkle et al., 2003).

A correlation coefficient is "an index that describes the extent to which two sets of data are related; it is a measure of the relationship between two variables" (Hinkle et al., 2003, p. 98). Further, a correlation coefficient such as "*r"* can take on values between -1.0 and +1.0 (Hinkle et al., 2003). The value of *"r"* has a strong variable relationship when it is close to "1" and a weak or no relationship the closer it is to "0" (Hinkle et al., 2003). If the value of *"r"* is positive it indicates that as one variable increases in value, the second variable also increase in value; similarly, as one variable decreases in value, the second variable also decreases in value (Hinkle et al., 2003). If the value of *"r"* is negative it indicates that one variable increases in value, the second variable decreases in value (Hinkle et al., 2003). Taylor (1990) stated that "labeling systems exist to roughly categorize "r" values where correlation coefficients (in absolute value) which are $\leq 0.35$ are generally considered to represent low or weak correlations, 0.36 to 0.67 modest or moderate correlations, and 0.68 to 1.0 strong or high correlations with "r" coefficients $\geq 0.90$ very high correlations" (p. 37).

Based on this study's results, it was determined if there was a relationship or not between the variables. If there is a relationship or difference between the variables, the $H_0$ must be rejected in favor of the $H_a$. Hinkle et al. (2003) asserts that "if we reject a true hypothesis or do not reject a false hypothesis, our decision is in error" (p. 177).

For this study, there were two null hypotheses and two alternate hypotheses. The two types of possible errors in hypothesis testing are Type I which is rejecting a null hypothesis when it is true and Type II which is failing to reject a null hypothesis when it is false (Hinkle et al., 2003). Also included in the interpretation of the results are the statistical tests and whether they are statistically significant or not (Hinkle et al., 2003). Statistical significance is defined as "the probability of making a Type I error when testing a null hypothesis and stated a different way, the difference between the hypothesized population parameter and the corresponding sample statistics is said to be statistically significant when the probability that the difference occurred by chance is less than the significance level (α or alpha level)" (Hinkle et al., 2003, p. 740). For this study, the researcher used a .05 and a .01 significance level, which means there was a 5% or 1% chance that the tests would find the alternate hypothesis to be possible when it is actually not. An alpha level at a small level, such as 01, would decrease the probability of making a Type I error, whereas, it increases the chances of making a Type II error.

Descriptive correlational analysis determined if there is support for this study's following hypotheses:

$H1_0$. There is no significant linear relationship between career self-efficacy and the decision to select higher education leadership as a career goal.

$H1_a$. There is a positive significant linear relationship between career self-efficacy and the decision to select higher education leadership as a career goal.

$H2_0$. There is no significant linear relationship between the outcome expectations of the higher education leadership profession held by female, African American higher education administration doctoral students and their decision to select higher education leadership as a career goal.

$H2_a$. There is a positive significant linear relationship between the outcome expectations of the higher education leadership profession held by African American higher education administration and doctoral students and their decision to select higher education leadership as a career goal.

This study employed a descriptive correlational approach to analysis, which focuses on whether or not a relationship exist among career self-efficacy, outcome expectations and study participants' decision to select higher education leadership as a career goal. A correlational approach is a quantitative strategy in which you have two or more quantitative variables from the same group of subjects to determine if a relationship exist between two variables (Waters, 2012). In this study, self-efficacy and outcome expectations represented the independent variables and vocational interests, barriers and supports represented the dependent variables. Independent variables are controlled or manipulated in the analysis (Hinkle et al., 2003). The dependent variable is presumed to be the result of manipulation of the independent variable (Hinkle et al., 2003). A descriptive correlational analysis determines if there is support for this study's research questions. This study also provided a demographic analysis of the study participants,

such as: (1) gender, (2) race, (3) employment in higher education, and (4) years in present position.

Creswell (2009) asserts that "quantitative data analysis should report the descriptive statistics, observations and measures, such as, the means, standard deviations and ranges" (p. 152). Descriptive statistics classifies and summarizes numerical data (Hinkle et al., 2003). The means provide direction on the average answer. The standard deviations give an indication of the average distance from the mean. A low standard deviation means that most observations will be closer to the mean. A high standard deviation would mean that there is variation in the answers (Creswell, 2009). A standard deviation of 0 is achieved when all responses to a question are the same. For purposes of this study, results will be presented in tables. Descriptive statistics were calculated using SPSS statistical software on the following items: self-efficacy, outcome expectations (power and satisfaction), vocational interests, barriers (discrimination and advancement opportunity) and supports (social and human capital). The descriptive statistics provide average survey responses and variation in the responses.

Researchers debate over the use of a Likert scale or rating scale for conducting quantitative, correlational analysis. Some researchers believe that Likert scales are purely ordinal, in which variables are considered qualitative; in contrast, interval scales reflect equal differences in the characteristic measured and are quantitative (Hinkle et al., 2003). Hinkle et al. (2003) defines an ordinal scale as one that "classifies objects or characteristics, but also give a logical order to the classification in which numbers are assigned, whereas interval scales have all the properties of those measured on ordinal scales, plus one additional property in which there are equal differences in the

characteristic measured"(p.10). Brown (2011) asserts that "researchers are often concerned with the differences among these scales of measurement because of their implications for making decisions about which statistical analyses to use appropriately for each" (p. 1). Brown (2011) further states the following:

> Despite all this discussion of the ordinal nature of Likert items and scales, most of the research based on Likert items and scales treats them as interval scales and analyzes them as such with descriptive statistics like means, standard deviations, etc. and inferential statistics like correlation coefficients, factor analysis, analysis of variance, etc. (p. 2)

For purposes of this study, the Likert scale was viewed as an interval scale and analyzed using statistics that assume interval data.

# Chapter 4

## Results

The objective of this study was to identify reasons why female African American who are enrolled in higher education administration doctoral programs become senior higher education leaders, i.e., college presidents, chief academic officers and vice-presidents. The study results are presented according to the four research questions:

1. What is the career self-efficacy of female African American doctoral students enrolled in higher education administration programs at select 4-year public universities?
2. What outcome expectations do female African American enrolled in higher education administration programs have as a result of selecting higher education leadership as a career choice?
3. What is the relationship between the career self-efficacy of female African American doctoral students enrolled in higher education administration programs and their decision to select higher education leadership as a career choice?
4. What is the relationship between outcome expectations of the higher education leadership profession held by female African American doctoral students enrolled in higher education administration programs and their decision to select higher education leadership as a career choice?

Prior to addressing the four research questions, a description of the sample and preliminary analysis are presented. Lastly, the descriptive statistics, Cronbach's alpha, Pearson Product Moment correlation analysis, and research question results are presented.

**Sample**

A study invitation was sent to 18 institutions with higher education administration doctoral programs, but only 12 institutions decided to participate in the study. The six institutions that did not participate in this study included four historically black universities, which accounted for 190 of the potential study participants in a population of 362. The other two institutions had a combined 20 potential study participants that did not participate in this study. This resulted in a population of 152 potential study participants for inclusion in this study. Forty-eight potential study participants (participants) responded to the survey invitation; however, some did not meet eligibility requirements to participate in the study. Forty-six (95.83%) responded "yes" to consent to participate in study and 36 (85.71%) participants were female. Thirty-one (86.11%) participants responded to being African American. Therefore, 31 participants met the female and African American eligibility requirement to participate in the study. Missing data were observed for 2 participants so the final sample size was 29 participants ($N = 29$). As a result, this study's response rate was 19.2%. The response rate is the percentage of people who responded to the SCCT online survey questionnaire. The response rate was determined by dividing the number of study participants (29) by the number of the potential population (152). An acceptable average response rate for online surveys is 30% (University of Texas, 2011). This study's response rate did not meet the acceptable average and therefore, the results of this study may not be representative of the target population, which is female African American doctoral students enrolled in higher education administration programs. A mean average of the scores was computed

on completed items. The mean average was utilized to compute the sum total of each case for each variable.

Demographic data were also collected, such as, the number of study participants currently working in higher education and years in current position, as presented in Table 3. Twenty-three (79.31%) participants responded "yes" to currently working in higher education; 6 (20.69%) participants responded "no" to currently working in higher education. Ten (35.71%) participants responded to "working less than 5 years in current position"; 6 (21.43%) "3 – 5 years in current position"; 8 (28.57%) "6 – 9 years in current position"; 2 (7.14%) "10 – 14 years in current position" and 2 (7.14%) "15 or more years in current position". The majority of study participants were working in higher education in some capacity, which suggests vocational interest and intent to pursue higher education leadership as a profession.

Table 3

| *Demographics* | *N* |
|---|---|
| Currently Working in Higher Education | 23 |
| Not Working in Higher Education | 6 |
| Working Less than 5 years in current position | 10 |
| 3 - 5 years in current position | 6 |
| 6 - 9 years in current position | 8 |
| 10 - 14 years in current position | 2 |
| 15 or more years in current position | 2 |

**Descriptive Statistics**

The descriptive statistics, means (*M)*, and standard deviations (*SD*) for scores of all measures are presented in Table 4. The means provide a direction on the average survey response based on the following survey scoring system: 7-strongly agree; 6-

agree; 5-agree somewhat; 4-undecided; 3-disagree somewhat; 2-disagree, and 1-strongly disagree. The standard deviations give an indication of the average distance between the mean. The mean data suggests high levels of self-efficacy, outcome expectations-satisfaction and vocational interests in higher education among students. The other variables suggests moderate levels among students. The standard deviation data suggest that there was not significant variation in participants' responses.

Table 4
*Descriptive Statistics*

| | ***M*** | ***SD*** | ***N*** |
|---|---|---|---|
| Self-Efficacy | 6.50 | 0.519 | 29.00 |
| Outcome Expectations: Satisfaction | 6.19 | 0.705 | 28.00 |
| Outcome Expectations: Power | 5.13 | 0.966 | 28.00 |
| Vocational Interests | 6.15 | 1.304 | 28.00 |
| Barriers: Discrimination | 5.34 | 1.001 | 28.00 |
| Barriers: Advancement | 4.19 | 0.678 | 28.00 |
| Supports: Human Capital | 5.67 | 1.416 | 28.00 |
| Supports: Social Capital | 4.87 | 1.703 | 28.00 |

**Cronbach's Alpha**

The reliability and accuracy of the SCCT questionnaire survey used in the study was tested for internal consistency using Cronbach's alpha (Alpha). As presented in Table 5, the following variable internal consistency results were collected: self-efficacy (.626), outcome expectations (.698), vocational interests (.901), barriers (.674) and

supports (.907). A commonly accepted rule of thumb is that an Alpha of 0.6 to 0.7 indicates acceptable reliability, and 0.8 or higher indicates good reliability (Gliem & Gliem, 2003). Very high reliability, 0.95 or higher is not necessarily desirable, as this indicates that the survey items may be entirely redundant (Tavakol & Dennick, 2011). Variables, self-efficacy, outcome expectations and barriers indicate acceptable reliability; whereas variables, vocational interests and supports indicate good reliability. Overall, the survey scores to items on the instrument were internally consistent.

Table 5
*Cronbach's Alpha*

| | Alpha |
|---|---|
| Self-Efficacy | 0.626 |
| Outcome Expectations: Satisfaction | 0.698 |
| Outcome Expectations: Power | 0.698 |
| Vocational Interests | 0.901 |
| Barriers: Discrimination | 0.674 |
| Barriers: Advancement | 0.674 |
| Supports: Human Capital | 0.907 |
| Supports: Social Capital | 0.907 |

**Pearson Product Moment Correlations**

Hypothesis testing was conducted using bivariate Pearson product moment correlational measures to create a correlation matrix as presented in Table 6. Support was found to accept Hypothesis 1, which states that a positive linear relationship between career self-efficacy and the decision to select higher education leadership as a career goal, as identified by the variable, vocational interests. The relationship between self-efficacy and vocational interests was $r = .58$ and it was significant at the .01 level ($p < .01$).

Therefore, the null hypothesis that no relationship exists was rejected. Similarly, support was found to accept Hypothesis 2, which states that a positive linear relationship exists between the outcome expectations of the higher education leadership profession held by female, African American higher education administration doctoral students and their decision to select higher education leadership as a career goal, as identified by the variable, vocational interests. The relationship between outcome expectations-satisfaction and vocational interests was $r = .384$, which indicated moderately significant at the .05 level ($p < .05$); however, the relationship between outcome expectations-power was not significant at $r = .18$.

Additional correlational analysis was conducted using variables, barriers-discrimination and barriers-advancement. Barriers-discrimination refers to students' perception of being treated differently based on their demographic characteristics, such as, age, race, gender, etc., in their pursuit of higher education leadership. Barriers-advancement refers to students' perception of being promoted quickly and having a hard time advancing in the higher education leadership profession. A correlational analysis indicated a moderate negative significant relationship existed between students' barriers-discrimination, barriers-advancement and vocational interests. The analysis concluded that the relationship was negative and significant for both, at $r = -.50$, ($p < .01$) and $r = -.43$ ($p < .05$), respectively. This relationship suggest that students' perceived that their pursuit of higher education leadership as a career would be hindered by barriers in discrimination and advancement.

Table 6
*Pearson Product Moment Correlations*

| **Variables** | **SE** | **OES** | **OEP** | **VI** | **BD** | **BA** | **SAC** | **SSC** |
|---|---|---|---|---|---|---|---|---|
| Self-Efficacy (SE) | | | | | | | | |
| Outcome Expectations: Satisfaction (OES) | .370 | | | | | | | |
| Outcome Expectations: Power (OEP) | .362 | .445* | | | | | | |
| Vocational Interests (VI) | .584* | .384* | .180 | | | | | |
| Barriers: Discrimination (BD) | -.373 | -.058 | -.336 | -.505* | | | | |
| Barriers: Advancement (BA) | -.245 | -.178 | -.366 | -.425* | .451* | | | |
| Supports: Human Capital (SAC) | .618* | .391* | .384* | .476* | -.029 | -.134 | | |
| Supports: Social Capital (SSC) | .442* | .182 | .448* | .062 | .024 | -.086 | .494* | |

***Correlation is significant**

**Research Question 1**

Research question 1 was "What is the career self-efficacy of female African American doctoral students enrolled in higher education administration programs at select 4-year public universities?" The variable, self-efficacy reported a mean value of 6.50 and standard deviation (*sd*) of .519, which indicates a strong self-efficacy in relation to the survey scoring system. The data suggests that students believe in their self-efficacy with respect to selecting higher education leadership as a profession. In other

words, they believe in their ability to succeed in higher education leadership as a profession. The demographic data reflected a majority of students currently working in the higher education profession, which suggest that there is strong vocational interest in selecting higher education as a career choice. Self-efficacy beliefs contribute to the creation and selection of educational pursuits and career paths. Perceived self-efficacy is behavior that involves implementing action based on confidence in knowledge (Bandura, 1986).

In addition, the correlation analysis identified a positive and significant relationship between self-efficacy and two variables, support human capital and support social capital where $r = .61$ ($p < .01$) and $r = .44$ ($p < .05$), respectively. If the value of *"r"* is positive it indicates that as one variable increases in value, the second variable also increase in value; similarly, as one variable decreases in value, the second variable also decreases in value (Hinkle et al., 2003). This relationship suggests that students moderately believed in their ability to have sufficient experience and education to enter the higher education leadership profession. The relationship also suggests that students moderately believed in their ability to have sufficient contacts and a large network to enter the higher education leadership profession.

**Research Question 2**

Research question 2 sought to examine the outcome expectations of female African American doctoral students. Specifically, "what outcome expectations do female African American enrolled in higher education administration programs have as a result of selecting higher education leadership as a career choice?" Outcome expectations-satisfaction refers to the benefits associated with selecting higher education leadership as

a career. Outcome expectations-power refers to the students' expected outcome as it relates to a good salary and their ability to hold a position of authority in higher education leadership. Variables, outcome expectations-satisfaction and outcome expectations-power reported mean values of 6.19, *sd* = .705 and 5.13, *sd* = .966 respectively. The data suggests that students have moderate outcome expectations-satisfaction associated with selecting higher education as a career; however, they do not hold the same expectations with respect to a good salary and their ability to hold a position of authority in higher education. The items capturing outcome expectations-satisfaction associated with the higher education leadership profession were "the opportunity to continue to be around the higher education profession", "satisfaction from being in the higher education profession" and "many benefits associated with being in the higher education profession".

In addition, the correlation analysis identified a positive and significant relationship between outcome expectations-power and variables, support human capital and support social capital where $r = .38$ ($p < .05$) and $r = .48$ ($p < .05$), respectively. Although a weak relationship, the outcome expectations-power, support human capital and support social capital relationship suggests that students believed that having sufficient experience and education may help them gain a good salary and a position of authority in higher education.

Further, the correlational analysis identified a moderate positive and significant relationship between outcome expectations-satisfaction and support human capital where $r = .39$, significant at the .05 level ($p < .05$). The outcome expectations-satisfaction and supports-human capital relationship suggests that students were moderately satisfied in

the higher education profession because of their ability to have sufficient contacts and a large network to enter the higher education leadership profession.

**Research Question 3**

Research question 3 sought to investigate the relationship between the career self-efficacy of female African American doctoral students enrolled in higher education administration programs and their decision to select higher education leadership as a career choice. A correlational analysis was conducted to identify whether a significant relationship existed between self-efficacy and vocational interests. The relationship between self-efficacy and vocational interests was $r = .58$ which was significant at the .01 level ($p < .01$). The data suggests that vocational interests moderately influences the decision to select higher education as a career goal. The analysis concluded that a significant and positive linear relationship existed between the two variables. Based on self-efficacy survey responses scored between six and seven, the data suggests that students strongly believed the following, as listed on the survey: (1) expect they can perform well in a job in the higher education profession, (2) self-assurance that they could earn a position within the higher education profession, (3) capable of learning the skills needed for a job in the higher education profession, and (4) confident that they could successfully work within the higher education profession.

**Research Question 4**

Research question 4 sought to examine "What is the relationship between outcome expectations of the higher education leadership profession held by female African American doctoral students enrolled in higher education administration programs and their decision to select higher education leadership as a career choice?" A

correlational analysis was conducted to identify whether a significant relationship existed between outcome expectations and doctoral students decision to select higher education leadership as a profession. The analysis concluded that the correlation of outcome expectations-satisfaction and vocational interests was $r = .384$, moderately significant at the .05 level ($p < .05$); however, the relationship between outcome expectations-power and vocational interests was not significant at $r = .18$.

The following section outlines a discussion of the current study, implications for future research and conclusion.

# Chapter 5

## Discussion

In an effort to understand the under-representation of African American women in higher education leadership, the current study examined the self-efficacy, outcome expectations, vocational interests, barriers and supports of female African American doctoral students enrolled in higher education administration programs. This study adds to the literature by (1) determining the career self-efficacy and outcome expectations of female African American doctoral students enrolled in higher education administration programs at select 4-year public universities; (2) examining the relationship between the career self-efficacy of African American female doctoral students enrolled in higher education administration programs and their decision to select higher education leadership as a career goal; and (3) examining the relationship between outcome expectations of the higher education leadership profession held by female African American doctoral students enrolled in higher education administration programs and their decision to select higher education leadership as a career choice.

The findings indicated that self-efficacy had a significant positive association with the higher education profession. As expected, female African American doctoral students reported higher levels of self-efficacy with respect to vocational interests, supports-human and social capital. These findings support previous findings by Hayes (2008) that found African American undergraduates studying public accounting to have high levels of self-efficacy with vocational interests, supports social and human capital. These findings also support previous findings by Cunningham et al. (2005) who examined undergraduate students' decision to select sport leisure as a career.

Cunningham et al. (2005) predicted that self-efficacy was related to vocational interests. Further, Lent et al. (1994) assert that an individual's performance in his or her interests is predicted by the behaviors pursued and his or her self-efficacy beliefs. For this study, the greater the student's belief about pursuing higher education leadership, the more likely they are to persist and be successful in higher education leadership, with available support systems.

Although the findings supported a positive significant relationship between self-efficacy, vocational interests, supports social and human capital, there was no support for self-efficacy and outcome expectations as predicted in Hayes (2008) and Cunningham et al. (2005). Cunningham et al. (2005) predicted that self-efficacy was related to both outcome expectations and vocational interests. Thus, professors should continue to motivate students towards persisting in higher education leadership through verbal persuasion because it increases self-efficacy and leads students to persevere towards their goal. Further, Bandura (1986) posits that if an individual believes he or she will be successful at a specific task, he or she will hold positive outcome expectations.

In the present study, outcome expectations-satisfaction held a positive significant relationship with vocational interests and support human capital. These findings also support previous findings by Fouad and Smith (1996) that found a small, but significant effect on outcome expectations and vocational interests in mathematics and science. These findings also support Hayes (2008) that predicted a moderate relationship between outcome expectations- satisfaction and power and vocational interests and supports-social and human capital. Cunningham et al. (2005) predicted outcome expectations-satisfaction were related to vocational interests. These findings support Lent et al.

(1994), Social Cognitive Career Theory (SCCT) that individuals who strive towards a vocational interest may have outcome expectations related to an entry-level position that includes monetary expectations, expectations of group acceptance and self-satisfaction. In this study, students had higher regard for expectations of group acceptance and self-satisfaction, than expecting a good salary.

Further, these findings indicated that outcome expectations-power held a moderately significant positive relationship with supports-human and social capital. Hayes (2008) predicted a weak, but significant relationship between outcome expectations-power, supports-human and social capital. The findings suggest that if students perceive that they have a greater social network and the required education, they will have positive outcome expectations in the higher education profession.

The findings also indicated barriers-discrimination and advancement held a moderate negative significant relationship with vocational interests. Hinkle et al. (2003) asserts that a negative significant relationship indicates that one variable increases in value, the second variable decreases in value. This assertion further supports Savickas and Lent (1994) that if an individual perceives significant barriers to an expected goal he or she is less likely to persist or he or she develops weaker interests. Therefore, as students in this study perceived increased barriers through discrimination and advancement, the less likely they were to persist in the higher education leadership profession. These findings are consistent with previous research by Cunningham et al. (2005) that "discrimination was perceived to impede one's attitudes and volition toward the sport and leisure field" (p. 134). Further, Cunningham et al. (2005) asserts that "both discrimination and a lack of advancement opportunities possibly encumber various

persons' careers" (p. 134). These findings are also consistent with previous research by Lloyd-Jones (2011) who asserts that "isolation, loneliness and lack of trust compound the effects of racism and sexism as barriers to African American women's full participation in the upper levels of academia" (p. 2). Thus, these findings should encourage further research to validate that support systems are in place which produce the desired outcome and a commitment from the academy to eliminate barriers. In addition, future inquiry regarding how students construct their perceptions of discrimination and advancement opportunities may provide a framework to eliminate barriers and build a network of support systems.

The findings did not find support for a significant relationship between outcome expectations-power and barriers. This finding may indicate that outcome expectations-satisfaction responses regarding higher education were more important to students in making career decisions than the level of position they may obtain in higher education. Lent et al. (1994) acknowledged that "an individual's career development will be impacted by perceived supports, opportunities and barriers and that these will vary by person and situation" (p.79). Support systems promote behavior that enables individuals to strive in achieving their career goal, whereas barriers hinder goal attainment. This study further supports Lent et al.'s SCCT model of performance that person inputs such as, gender, race and learning experiences impact an individual's interests, goals and actions.

Since this study's response rate did not meet the acceptable average response rate, the results may not be representative of the target population, which is female African American doctoral students enrolled in higher education administration programs.

## Conclusion

This study was conducted to examine the self-efficacy and outcome expectations that female African American doctoral students in higher education administration programs have as it relates to their decision to select higher education leadership as a career goal. In this study, self-efficacy was found to be a contributing factor in doctoral students' decision to select and pursue higher education administration as a career.

Study participants were found to have high self-efficacy related to the higher education profession and a moderate level of outcome expectations-satisfaction that could be gained by entering the profession. Study participants were also found to have a moderate level of outcome-expectations-satisfaction and power related to their ability to have a sufficient professional network of people in the field of higher education and moderate levels of outcome expectations-power related to their ability to have sufficient education and training to enter the higher education profession. In addition, study participants also perceived moderate levels of barriers with respect to their decision to select higher education as a career. This study adds to the literature regarding female African American doctoral students and hopefully encourages future research which could provide additional understanding of other under-represented populations in the academy.

## Implications for Future Research

There are many implications for future research because so few studies investigated the under-representation of African American females in higher education leadership. This study was one of very few studies focused on female African American doctoral students. There are future inquiries to expand the body of literature, such as, do

female African American doctoral students have mentors and if so, do they have higher self-efficacy than those who do not?

This study's findings indicated that students held a negative association with barriers-discrimination and advancement with respect to their decision to select higher education as a career. This revelation should encourage further research to explore what support systems are in place that produce the desired outcome and how various commitments from the academy can eliminate barriers. Fink, Pastore, and Riemer (2001) research suggests that diversity management strategies are predictive of recruitment and attraction of talented workers, including persons from diverse backgrounds. As demographics change in the academy, studies about under-represented populations may add value because they may prepare the academy for change and reinforce its commitment to diversity. Future research should continue to investigate the perceptions of African American students, to include African American males. The literature supports that African American males have lagged behind African American females in attendance and completion of college (*Chronicle,* 2013). An exploration into the self-efficacy of African American males may lead to a framework to improve in college attendance and retention rates among African American males.

Another question to explore is, "how do female African American students communicate their perceptions of barriers in discrimination and advancement?" Future research should also explore other careers, academic disciplines and other under-represented populations. Do perceptions vary depending on type of institution (i.e., HBCU), vocational interests, academic discipline, race or gender?

Future studies employing a qualitative methodology, with a phenomenological approach may reveal greater insight into the perceptions held by women in higher education leadership. Phenomenology is an attempt to understand what we directly experience (Crotty, 2005). In future studies of female African American populations in higher education, phenomenology should attempt to gain an understanding of the professional and personal experiences of active female African American leaders in higher education. A phenomenological study may also yield a career development framework specific to female African Americans. A qualitative research study may also capture the essence of study participants' self-efficacy, outcome expectations, vocational interests, barriers and support and thereby, expand the current research.

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Appendix A
Number African American (AA) Females,
Ed.D or Ph.D., Higher Education Administration Programs

| University Name | Location | AA Females | Contact |
|---|---|---|---|
| Fayetteville State University (HBCU) | Fayetteville, North Carolina | 37 | Carolyn Ortiz, cortiz@uncfsu.edu 910-672-1393 |
| Jackson State University (HBCU) | Jackson, Mississippi | 39 | Sylvia Wynne sylvia.k.wynne@jsums.edu 601-979-2935 |
| Alabama State University (HBCU) | Montgomery, Alabama | 59 | Leslie Head ljolly@alasu.edu 334-229-4250 Dr. Jing Zhao jzhao@alasu.edu 334-229-6859 |
| Auburn University | Auburn, Alabama | 6 | Lisa Zhang zzz0004@auburn.edu 334-844-4773 |
| University of Mississippi | Oxford, Mississippi | 3 | Tiffany Gregory tlgregor@olemiss.edu 662-915-7387 |
| University of Memphis | Memphis, Tennessee | 14 | Bridgette Decent bdecent@memphis.edu 901-678-5502 |
| University of Alabama | Tuscaloosa, Alabama | 8 | Katy Galloway kgalloway@bamaed.ua.edu 205-348-3828 |
| Georgia Southern University | Statesboro, Georgia | 52 | Cindy Groover cgroover@georgiasouthern.edu 912-478-8666 |
| University of Arkansas | Fayetteville, Arkansas | 5 | Doug Miles dmiles@uark.edu 479-575-5252 |

(table continues)

Appendix A
Number African American (AA) Females,
Ed.D or Ph.D., Higher Education Administration

| University Name | Location | AA Females | Contact |
|---|---|---|---|
| Tennessee State University (HBCU) | Nashville, Tennessee | 55 | Eric Williams<br>ewilli11@tnstate.edu<br>615-963-4926 |
| University of Miami | Miami, Florida | 2 | Wien Yu<br>wyu@miami.edu<br>305-284-3037 |
| University of South Carolina | Columbia, South Carolina | 6 | Megan Penfield<br>kula@mailbox.sc.edu<br>803-777-2814 |
| University of Tennessee | Knoxville, Tennessee | 3 | Tracy Randolph<br>trandolp@utk.edu<br>865.974.4373 |
| Texas A & M University | College Station, Texas | 22 | Xiaoyan Wang<br>xiaoyanw@tamu.edu<br>979-845-3887 |
| University of Texas | San Antonio, Texas | 5 | Brian Cordeau<br>brian.cordeau@utsa.edu<br>210-458-4705 |
| University of Texas | Arlington, Texas | 18 | Diana Hooten<br>hooten@uta.edu<br>817-272-9498 |
| University of North Texas | Denton, Texas | 15 | Dave Downing<br>dave.downing@unt.edu<br>940-565-2085 |
| Sam Houston University | Huntsville, Texas | 13 | Amanda Clark<br>akc015@SHSU.edu<br>936-294-3619 |
| | | 362 | |

Appendix B
Survey Email

Dear Institutional Research or IRB Representative:

My name is Rosalynn Martin and I'm enrolled in the University of Memphis Higher Education doctoral program. I contacted your office in June 2013 regarding an upcoming study. As a follow-up, I am writing to invite all African American female students enrolled in your doctoral Higher Education program to participate in a dissertation study. The purpose of this study is to identify reasons why African American women in higher education doctoral programs seek to become senior higher education leaders, i.e., college presidents, provosts, vice presidents. I am requesting your assistance to ensure that the following SurveyMonkey link is forwarded (preferably, by email) to all students enrolled in your doctoral Higher Education program:
https://www.surveymonkey.com/s/BMR8G5T.

Per your request, I have attached my approved IRB notice from the University of Memphis. Please let me know if additional information is required.

Thanks in advance for considering this request.

Rosalynn Martin

Appendix C
Survey Reminder

Dear Institutional Research or IRB Representative:

I recently sent you a survey link to invite all African American female students enrolled in your doctoral Higher Education program to participate in a dissertation study. If you have already forwarded the survey link to students, thank you. The purpose of this study is to identify reasons why African American women in higher education doctoral programs seek to become senior higher education leaders, i.e., college presidents, provosts, vice presidents. I am requesting your assistance to ensure that the following SurveyMonkey link is forwarded (preferably, by email) to all students enrolled in your doctoral Higher Education program: https://www.surveymonkey.com/s/BMR8G5T.

Per your request, I have attached my approved IRB notice from the University of Memphis. Please let me know if additional information is required.

Thanks in advance for considering this request.

Rosalynn Martin

Appendix D
Consent to Participate in Research Study

Dear Higher Education Administration Doctoral Student:

My name is Rosalynn Martin and I'm enrolled in the University of Memphis Higher Education Administration doctoral program. You are being invited to participate in a study. The purpose of this study is to identify reasons why African American women in higher education doctoral programs seek to become senior higher education leaders, i.e., college presidents, chief academic officers, vice presidents. You will be asked several questions about your self-efficacy, which is defined as your belief and judgments about your ability to succeed.

I expect that completing this survey will take some time, perhaps as much as 30 - 35 minutes. While your involvement is clearly voluntary, we hope you will appreciate the benefits of having this information from a large sample of institutions and therefore share what your institution is doing. We foresee only minimal risk to you by participating in this survey. You may exit the survey at any time, exit and return at a later time, or skip items.

If you decide to participate in this study, you will be asked to electronically sign a consent form and complete an online survey questionnaire about your career self-efficacy, outcome expectations and vocational interests. The survey data will be kept by me and will be shared while maintaining confidentiality with my doctoral faculty advisor, Dr. Katrina Meyer at the University of Memphis. I will analyze the data and keep it for three years for educational and research purposes. There is no direct benefit for you for participating in this study. No risk is expected, but if you experience some discomfort or stress during this process, then you can choose to discontinue your participation in the study without any penalty.

Remember, this is completely voluntary. You can choose to be in the study or not. If you'd like to participate, please click on the link below through SuveryMonkey.

Yes (Please proceed to the next page)

No (Thank you for your time)

Appendix E
SCCT Survey Questionnaire

*Are you female?* Yes_____ No _____
Yes (Please proceed to the next page)
No (Thank you for your time)

Do you identify yourself as African American? Yes _____ No _____
For purposes of this study, Black or African American is defined as people having origins in any of the Black racial groups of Africa.

Yes (Please proceed to the next page)
No (Thank you for your time)

This section of the survey contains statements about self-efficacy beliefs, outcome expectations and career choice goal. For purposes of this study, self-efficacy is defined as your belief and judgments about your ability to succeed. Outcome expectations refer to your perception about benefits you may gain as a higher education leader and vocational interests refer to your intent to make higher education leadership a career choice goal or not. Your barriers and support will also be examined in this survey. Next to each statement, select the number that best represents how strongly you feel about the statement by using the following scoring system:

7-strongly agree
6-agree
5-agree somewhat
4-undecided
3-disagree somewhat
2-disagree
1-strongly disagree

| **Self-Efficacy** | **Responses** | | | | | | |
|---|---|---|---|---|---|---|---|
| I expect I can perform well in a job in higher education leadership. | 1 | 2 | 3 | 4 | 5 | 6 | 7 |
| I have self-assurance that I could earn a position within higher education leadership. | 1 | 2 | 3 | 4 | 5 | 6 | 7 |
| Because of my capabilities, I expect I can earn a position as a leader in higher education. | 1 | 2 | 3 | 4 | 5 | 6 | 7 |
| I am capable of learning the skills needed for a job in higher education leadership. | 1 | 2 | 3 | 4 | 5 | 6 | 7 |
| I am confident I could successfully work within higher education. | 1 | 2 | 3 | 4 | 5 | 6 | 7 |
| The work I would do in higher education administration would be very difficult for me. (reversed scored) | 1 | 2 | 3 | 4 | 5 | 6 | 7 |

Appendix E
SCCT Survey Questionnaire

7-strongly agree
6-agree
5-agree somewhat
4-undecided
3-disagree somewhat
2-disagree
1-strongly disagree

| Outcome Expectations | Responses |
|---|---|
| Entering the higher education leadership field would mean the opportunity to continue to be in higher education activities. | 1 2 3 4 5 6 7 |
| Entering the higher education leadership field would mean satisfaction from being in the higher education environment. | 1 2 3 4 5 6 7 |
| Entering the higher education leadership field would mean many benefits associated with higher education leadership. | 1 2 3 4 5 6 7 |
| Entering the higher education leadership field would mean a good salary. | 1 2 3 4 5 6 7 |
| Entering the higher education leadership field would mean power in my job. | 1 2 3 4 5 6 7 |
| Entering the higher education leadership field would mean the ability to hold a position of authority. | 1 2 3 4 5 6 7 |

| Vocational Interests | Responses |
|---|---|
| Entering higher education leadership following graduation is something that interests me. | 1 2 3 4 5 6 7 |
| Working in higher education leadership following graduation would be an interesting option for me. | 1 2 3 4 5 6 7 |
| I have no interest working in higher education leadership once I graduate (reverse scored). | 1 2 3 4 5 6 7 |
| Working in higher education leadership does not really interest me (reverse scored). | 1 2 3 4 5 6 7 |

Appendix E
SCCT Survey Questionnaire

7-strongly agree
6-agree
5-agree somewhat
4-undecided
3-disagree somewhat
2-disagree
1-strongly disagree

| Barriers | Responses | | | | | | |
|---|---|---|---|---|---|---|---|
| It is possible that I will be treated differently within the ranks of higher education leadership because of my demographics (e.g., age, gender, and race). | 1 | 2 | 3 | 4 | 5 | 6 | 7 |
| I do not foresee being treated differently in higher education leadership based on my demographics (e.g., age, gender, and race). (reverse scored). | 1 | 2 | 3 | 4 | 5 | 6 | 7 |
| I anticipate facing discrimination in higher education leadership based on my demographics (e.g., age, gender, and race). | 1 | 2 | 3 | 4 | 5 | 6 | 7 |
| I will be treated differently within higher education leadership because of my demographics (e.g., age, gender, and race). | 1 | 2 | 3 | 4 | 5 | 6 | 7 |
| Within the context of higher education leadership, I feel as if I would be promoted quickly (reverse scored). | 1 | 2 | 3 | 4 | 5 | 6 | 7 |
| Within the context of higher education leadership, I feel as if I would have a hard time advancing in the profession. | 1 | 2 | 3 | 4 | 5 | 6 | 7 |
| Within the context of higher education leadership, I feel as if I would have several opportunities for career advancement. | 1 | 2 | 3 | 4 | 5 | 6 | 7 |
| Within the context of higher education leadership, I feel as if I would have few chances to get ahead. | 1 | 2 | 3 | 4 | 5 | 6 | 7 |

Appendix E
SCCT Survey Questionnaire

7-strongly agree
6-agree
5-agree somewhat
4-undecided
3-disagree somewhat
2-disagree
1-strongly disagree

| Supports | Responses |
|---|---|
| I have sufficient previous experience to enter higher education leadership. | 1 2 3 4 5 6 7 |
| My educational background has prepared me for a job in higher education leadership. | 1 2 3 4 5 6 7 |
| I feel as if I have sufficient contacts to help me in entering higher education leadership. | 1 2 3 4 5 6 7 |
| I have a large enough network of contacts to make entering higher education leadership possible. | 1 2 3 4 5 6 7 |
| I do not have the contacts to help me earn a job in higher education leadership (reverse scored). | 1 2 3 4 5 6 7 |
| I feel as if I know enough people in the field to obtain a position within higher education leadership. | 1 2 3 4 5 6 7 |

***Other Demographic Information:***

1. Are you currently working in higher education? _____ Yes _____ No

2. Years in present position:
   _____ Less than 3 years
   _____ 3 – 5 years
   _____ 6 – 9 years
   _____ 10 – 14 years
   _____ 15 or more years
   _____ Not applicable

Appendix F
Permission to Use SCCT Survey Questionnaire

Hi Rosalyn

That is fine with me. I wish you well with the research.

Peace,
George
---
George B. Cunningham, PhD
Professor and Associate Dean for Academic Affairs
Marilyn Kent Byrne Chair for Student Success
College of Education and Human Development | Texas A&M University
4222 TAMU | College Station, Texas 77843-4222
Tel. 979.458.3560 | Fax. 979.862.4352
http://education.tamu.edu http://www.diversityinsport.com
SCCT Developer: Dr. George B. Cunningham, Texas A & M University

From: "Rosalynn Martin (rmartin2)" <rmartin2@memphis.edu>
Date: Sunday, September 16, 2012 12:16 PM
To: "George B. Cunningham" <gbcunningham@tamu.edu>
Subject: Permission Request: SCCT Survey

Dear Dr. Cunningham:

My name is Rosalynn Martin and I'm a doctoral student in the University of Memphis, Ed.D, Higher and Adult Education Administration program. My doctoral faculty advisor is Dr. Katrina Meyer. I am currently A.B.D. and working on my dissertation proposal. I am writing to request permission to use the SCCT Likert Survey as applied in your study, The Application of Social Cognitive Career Theory to Sport and Leisure Career Choices.

I am proposing a study to identify the important reasons why few African American women who graduate from higher education leadership doctoral programs become senior higher education leaders, i.e., college presidents, provosts, etc. I want to be certain I have permission to use the survey before moving forward with the proposal.

Your response and approval is greatly appreciated.

Thank you,
Rosalynn Martin
rmartin2@memphis.edu
256-403-8108

Appendix G

Permission to Use Model of Social Cognitive Influences on Career Choice Behavior

**From:** Rosalynn Martin (rmartin2) [mailto:rmartin2@memphis.edu]
**Sent:** Tuesday, August 27, 2013 10:05 PM
**To:** Robert W. Lent
**Subject:** Permission Requested: Model of Social Cognitive Influences
**Importance:** High

Dear Dr. Lent:

My name is Rosalynn Martin and I'm a doctoral student at the University of Memphis, Higher and Adult Education Administration program. My doctoral faculty advisor is Dr. Katrina Meyer. I am currently A.B.D. and working on my dissertation proposal. I am writing to request permission to use the following figure as part of my dissertation proposal:

*Figure I.* Model of social cognitive influences on career choice behavior. Note that dotted paths indicate moderator effects on interest-goal and goal-action relations. From "Toward a Unifying Social Cognitive Theory of Career and Academic Interest, Choice, and Performance" [Monograph], by R. W. Lent, S. D. Brown, and G. Hackett, 1994, *Journal of Vocational Behavior, 45,* p. 93

I am proposing a study to apply the social cognitive career theory, to identify the important reasons why few African American women who graduate from higher education leadership doctoral programs become senior higher education leaders, i.e., college presidents, chief academic officers, etc. I want to be certain I have permission to use the model of social cognitive influences before moving forward with the proposal.

Your response and permission is greatly appreciated.

Thank you,
Rosalynn Martin
rmartin2@memphis.edu
256-403-8108
Wed 8/28/2013 10:23 AM

RE: Permission Requested: Model of Social Cognitive Influences
From: Robert W. Lent <boblent@umd.edu>
To: Rosalynn Martin (rmartin2);
You replied on 8/29/2013 8:56 AM.
You are welcome to reprint the figure as part of your dissertation.
Best wishes with your research,
Dr. Lent

Appendix H
University of Memphis IRB Approval

Hello,
The University of Memphis Institutional Review Board, FWA00006815, has reviewed and approved your submission in accordance with all applicable statuses and regulations as well as ethical principles.
**PI NAME:** Rosalynn Martin
**CO-PI:**
**PROJECT TITLE:** Examining the Factors Influencing Female African American Doctoral Students to Select Higher Education Leadership as a Career
**FACULTY ADVISOR NAME (if applicable):** Katrina Meyer
**IRB ID:** #2920
**APPROVAL DATE:** 12/3/2013
**EXPIRATION DATE:** 12/2/2014
**LEVEL OF REVIEW:** Exempt
**RISK LEVEL DETERMINATION:**No more than minimal
*Please Note: Modifications do not extend the expiration of the original approval*
Approval of this project is given with the following obligations:

1. If this IRB approval has an expiration date, an approved renewal must be in effect to continue the project prior to that date. If approval is not obtained, the human consent form(s) and recruiting material(s) are no longer valid and any research activities involving human subjects must stop.

2. When the project is finished or terminated, a completion form must be completed and sent to the board.

3. No change may be made in the approved protocol without prior board approval, whether the approved protocol was reviewed at the Exempt, Exedited or Full Board level.

4. Exempt approval are considered to have no expiration date and no further review is necessary unless the protocol needs modification.

Approval of this project is given with the following special obligations:
The consent form contains a typo that warrants a correction. "higher education higher education" is repeated.

Thank you,
Ronnie Priest, PhD
Institutional Review Board Chair
The University of Memphis.
*Note: Review outcomes will be communicated to the email address on file. This email should be considered an official communication from the UM IRB. Consent Forms are no longer being stamped as well. Please contact the IRB at IRB@memphis.edu if a letter on IRB letterhead is required.*